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STRUCTURE FILE UPDATES: 21 SEP 2004 HIGHEST RN 749178-43-6 DICTIONARY FILE UPDATES: 21 SEP 2004 HIGHEST RN 749178-43-6

TSCA INFORMATION NOW CURRENT THROUGH MAY 21, 2004

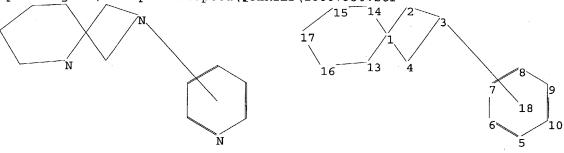
Please note that search-term pricing does apply when conducting SmartSELECT searches.

Crossover limits have been increased. See HELP CROSSOVER for details.

Experimental and calculated property data are now available. For more information enter HELP PROP at an arrow prompt in the file or refer to the file summary sheet on the web at: http://www.cas.org/ONLINE/DBSS/registryss.html

=>

Uploading C:\Stnexp4 corrupted\QUERIES\10607930.str



ring nodes :

1 2 3 4 5 6 7 8 9 10 13 14 15 16 17

ring bonds :

exact/norm bonds :

1-4 1-2 1-13 1-14 2-3 3-4 13-16 14-15 15-17 16-17

normalized bonds :

5-6 5-10 6-7 7-8 8-9 9-10

G1:C, N

Match level :

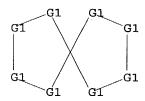
1:Atom 2:Atom 3:Atom 4:Atom 5:Atom 6:Atom 7:Atom 8:Atom 9:Atom 10:Atom 13:Atom 14:Atom 15:Atom 16:Atom 17:Atom 18:CLASS

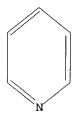
L1 STRUCTURE UPLOADED

=> d 11

L1 HAS NO ANSWERS

STR





G1 C,N

Structure attributes must be viewed using STN Express query preparation.

SAMPLE SEARCH INITIATED 15:02:03 FILE 'REGISTRY' SAMPLE SCREEN SEARCH COMPLETED - 113848 TO ITERATE

0.9% PROCESSED

1000 ITERATIONS

INCOMPLETE SEARCH (SYSTEM LIMIT EXCEEDED) SEARCH TIME: 00.00.01

FULL FILE PROJECTIONS:

ONLINE \*\*INCOMPLETE\*\*

BATCH

\*\*INCOMPLETE\*\*

PROJECTED ITERATIONS:

EXCEEDS 1000000

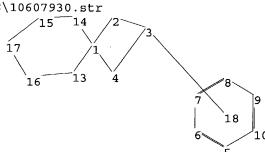
PROJECTED ANSWERS:

EXCEEDS

Ŀ2

0 SEA SSS SAM L1

Uploading C:\Stnexp4 corrupted\QUERIES\10607930.str



0 ANSWERS

ring nodes :

1 2 3 4 5 6 7 8 9 10 13 14 15 16 17

ring bonds :

1-4 1-2 1-13 1-14 2-3 3-4 5-6 5-10 6-7 7-8 8-9 9-10 13-16 14-15 15-17 16-17

exact/norm bonds :

1-4 1-2 1-13 1-14 2-3 3-4 13-16 14-15 15-17 16-17

normalized bonds :

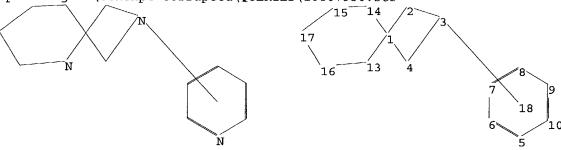
5-6 5-10 6-7 7-8 8-9 9-10

#### G1:C,N

Match level :

1:Atom 2:Atom 3:Atom 4:Atom 5:Atom 6:Atom 7:Atom 8:Atom 9:Atom 10:Atom 13:Atom 14:Atom 15:Atom 16:Atom 17:Atom 18:CLASS

Uploading C:\Stnexp4 corrupted\QUERIES\10607930.str



ring nodes :

1 2 3 4 5 6 7 8 9 10 13 14 15 16 17

ring bonds :

1-4 1-2 1-13 1-14 2-3 3-4 5-6 5-10 6-7 7-8 8-9 9-10 13-16 14-15 15-17

16-17

exact/norm bonds :

1-4 1-2 1-13 1-14 2-3 3-4 13-16 14-15 15-17 16-17

normalized bonds :

5-6 5-10 6-7 7-8 8-9 9-10

# G1:C,N

Match level :

1:Atom 2:Atom 3:Atom 4:Atom 5:Atom 6:Atom 7:Atom 8:Atom 9:Atom 10:Atom 13:Atom 14:Atom 15:Atom 16:Atom 17:Atom 18:CLASS

STRUCTURE UPLOADED L3

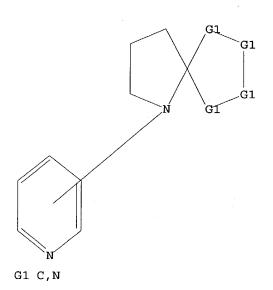
=> d 13

L3 HAS NO ANSWERS

10607930

L3

STR



Structure attributes must be viewed using STN Express query preparation.

=> s 13

SAMPLE SEARCH INITIATED 15:04:36 FILE 'REGISTRY' SAMPLE SCREEN SEARCH COMPLETED - 42968 TO ITERATE

2.3% PROCESSED 1000 ITERATIONS INCOMPLETE SEARCH (SYSTEM LIMIT EXCEEDED) SEARCH TIME: 00.00.01

0 ANSWERS

FULL FILE PROJECTIONS:

ONLINE \*\*INCOMPLETE\*\*

BATCH \*\*INCOMPLETE\*\*

PROJECTED ITERATIONS:

846997 TO 871723

PROJECTED ANSWERS:

0 TO

L4

0 SEA SSS SAM L3

=> logoff y\ 'Y\' IS NOT VALID HERE For an explanation, enter "HELP LOGOFF".

=> logoff y

COST IN U.S. DOLLARS

SINCE FILE TOTAL

ENTRY

SESSION

FULL ESTIMATED COST

2.94 3.15

STN INTERNATIONAL LOGOFF AT 15:05:50 ON 22 SEP 2004

Connecting via Winsock to STN

Welcome to STN International! Enter x:x

LOGINID:ssspta1612rxd

PASSWORD:

TERMINAL (ENTER 1, 2, 3, OR ?):2

```
Welcome to STN International
NEWS
                 Web Page URLs for STN Seminar Schedule - N. America
      1
NEWS
                 "Ask CAS" for self-help around the clock
NEWS
                 BEILSTEIN enhanced with new display and select options,
         Jul 12
                 resulting in a closer connection to BABS
NEWS
         Jul 30
                 BEILSTEIN on STN workshop to be held August 24 in conjunction
                 with the 228th ACS National Meeting
         AUG 02
NEWS
      5
                 IFIPAT/IFIUDB/IFICDB reloaded with new search and display
                 fields
NEWS
         AUG 02
                 CAplus and CA patent records enhanced with European and Japan
                 Patent Office Classifications
NEWS
     7
         AUG 02
                 The Analysis Edition of STN Express with Discover!
                 (Version 7.01 for Windows) now available
NEWS
     8
         AUG 04
                 Pricing for the Save Answers for SciFinder Wizard within
                 STN Express with Discover! will change September 1, 2004
NEWS
     9
         AUG 27
                 BIOCOMMERCE: Changes and enhancements to content coverage
                 BIOTECHABS/BIOTECHDS: Two new display fields added for legal
NEWS 10
         AUG 27
                 status data from INPADOC
NEWS 11
         SEP 01
                 INPADOC: New family current-awareness alert (SDI) available
NEWS 12
                 New pricing for the Save Answers for SciFinder Wizard within
         SEP 01
                 STN Express with Discover!
NEWS 13
         SEP 01
                 New display format, HITSTR, available in WPIDS/WPINDEX/WPIX
NEWS 14
         SEP 14
                 STN Patent Forum to be held October 13, 2004, in Iselin, NJ
NEWS EXPRESS
              JULY 30 CURRENT WINDOWS VERSION IS V7.01, CURRENT
              MACINTOSH VERSION IS V6.0c(ENG) AND V6.0Jc(JP),
              AND CURRENT DISCOVER FILE IS DATED 11 AUGUST 2004
NEWS HOURS
              STN Operating Hours Plus Help Desk Availability
NEWS INTER
              General Internet Information
NEWS LOGIN
              Welcome Banner and News Items
NEWS PHONE
              Direct Dial and Telecommunication Network Access to STN
NEWS WWW
              CAS World Wide Web Site (general information)
```

Enter NEWS followed by the item number or name to see news on that specific topic.

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FILE 'HOME' ENTERED AT 15:11:52 ON 22 SEP 2004

=>

\_\_\_

Uploading

THIS COMMAND NOT AVAILABLE IN THE CURRENT FILE Do you want to switch to the Registry File?

Choice (Y/n):

Switching to the Registry File...

Some commands only work in certain files. For example, the EXPAND command can only be used to look at the index in a file which has an index. Enter "HELP COMMANDS" at an arrow prompt (=>) for a list of commands which can be used in this file.

#### => FILE REGISTRY

 COST IN U.S. DOLLARS
 SINCE FILE
 TOTAL

 ENTRY
 SESSION

 FULL ESTIMATED COST
 0.21
 0.21

FILE 'REGISTRY' ENTERED AT 15:12:07 ON 22 SEP 2004
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STRUCTURE FILE UPDATES: 21 SEP 2004 HIGHEST RN 749178-43-6 DICTIONARY FILE UPDATES: 21 SEP 2004 HIGHEST RN 749178-43-6

TSCA INFORMATION NOW CURRENT THROUGH MAY 21, 2004

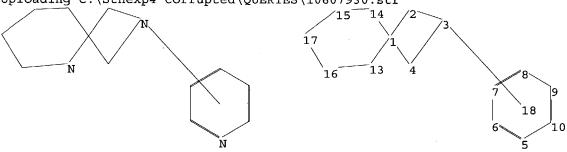
Please note that search-term pricing does apply when conducting SmartSELECT searches.

Crossover limits have been increased. See HELP CROSSOVER for details.

Experimental and calculated property data are now available. For more information enter HELP PROP at an arrow prompt in the file or refer to the file summary sheet on the web at: http://www.cas.org/ONLINE/DBSS/registryss.html

=>

Uploading C:\Stnexp4 corrupted\QUERIES\10607930.str



ring nodes :

1 2 3 4 5 6 7 8 9 10 13 14 15 16 17

ring bonds :

exact/norm bonds :

1-4 1-2 1-13 1-14 2-3 3-4 13-16 14-15 15-17 16-17 normalized bonds : 5-6 5-10 6-7 7-8 8-9 9-10

G1:C,N

Match level :

1:Atom 2:Atom 3:Atom 4:Atom 5:Atom 6:Atom 7:Atom 8:Atom 9:Atom 10:Atom 13:Atom 14:Atom 15:Atom 16:Atom 17:Atom 18:CLASS

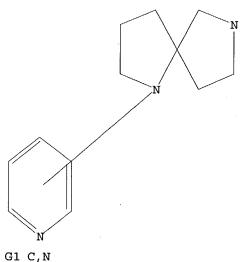
L1STRUCTURE UPLOADED

STR

=> d l1

L1 HAS NO ANSWERS

L1



Structure attributes must be viewed using STN Express query preparation.

=> s l1

SAMPLE SEARCH INITIATED 15:12:24 FILE 'REGISTRY' SAMPLE SCREEN SEARCH COMPLETED - 307 TO ITERATE

100.0% PROCESSED 307 ITERATIONS

0 ANSWERS

SEARCH TIME: 00.00.01

FULL FILE PROJECTIONS: ONLINE \*\*COMPLETE\*\*

BATCH \*\*COMPLETE\*\*

7191

PROJECTED ITERATIONS: 5089 TO

PROJECTED ANSWERS: 0 TO

L20 SEA SSS SAM L1

=> s 11 ful

L3

FULL SEARCH INITIATED 15:12:29 FILE 'REGISTRY'
FULL SCREEN SEARCH COMPLETED - 6161 TO ITERATE

100.0% PROCESSED 6161 ITERATIONS

4 ANSWERS

SEARCH TIME: 00.00.01

4 SEA SSS FUL L1

=> file caplus
COST IN U.S. DOLLARS

SINCE FILE

TOTAL

COST IN U.S. DOLLARS

ENTRY

SESSION

FULL ESTIMATED COST

155.42 155.63

FILE 'CAPLUS' ENTERED AT 15:12:33 ON 22 SEP 2004
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FILE COVERS 1907 - 22 Sep 2004 VOL 141 ISS 13 FILE LAST UPDATED: 21 Sep 2004 (20040921/ED)

This file contains CAS Registry Numbers for easy and accurate substance identification.

=> s 13

L4

1 L3

=> d abs bib hitstr

L4 ANSWER 1 OF 1 CAPLUS COPYRIGHT 2004 ACS on STN GI

AΒ Compds., pharmaceutical compns. including the compds., and methods of preparation and use thereof are disclosed. The compds. are N-aryl diazaspirocyclic compds. (shown as I and II; variables defined below; e.g. III), bridged analogs of N-heteroaryl diazaspirocyclic compds., or prodrugs or metabolites of these compds. The aryl group can be a five or six-membered heterocyclic ring (heteroaryl). The compds. and compns. can be used to treat and/or prevent a wide variety of conditions or disorders, particularly those disorders characterized by dysfunction of nicotinic cholinergic neurotransmission, including disorders involving neuromodulation of neurotransmitter release, such as dopamine release. CNS disorders, which were characterized by an alteration in normal neurotransmitter release, are another example of disorders that can be treated and/or prevented. The compds. and compns. can also be used to alleviate pain. The compds. can alter the number of nicotinic cholinergic receptors of the brain of the patient, exhibit neuroprotective effects and when employed in effective amts., not result in appreciable adverse side effects (e.g. side effects such as significant increases in blood pressure and heart rate, significant neg. effects upon the gastrointestinal tract, and significant effects upon skeletal muscle). For the  $\alpha 4\beta 2$ subtype, the Ki value for each of the examples of I was <1  $\mu\text{M}$ , indicating that I bind tightly to the receptor. Although the methods of preparation are not claimed, 13 example prepns. are included. For example, III was prepared in 5 steps (76, 93, 96, 66 and 88 % yields, resp.) starting from Et (S)-N-benzylpyrrolidine-2-carboxylate and nitroethylene and involving intermediates Et 2-(2-nitroethyl)-1-benzylpyrrolidine-2carboxylate, 6-benzyl-2,6-diazaspiro[4.4]nonan-1-one, 1-benzyl-1,7diazaspiro[4.4] nonane and 1-benzyl-7-(3-pyridyl)-1,7diazaspiro[4.4] nonane. For I: Q1 is (CZ2)u; QII is (CZ2)v; QIII is (CZ2)w; and QIV is (CZ2)x; u, v, w and x are individually 0-4, preferably 0-3; R is H, lower alkyl, acyl, alkoxycarbonyl or aryloxycarbonyl; Z is H

```
and (un) substituted alkyl, cycloalkyl, heterocyclyl, aryl, alkylaryl,
      arylalkyl; Cy is a six membered ring linked via C to the N of the rest of
      I and each of the remaining ring atoms = N, N bonded to O or C bonded to a
      substituent species, wherein ≤3 are N or N bonded to O, or Cy is a
      five 5-membered heteroarom. ring linked via C to the N of the rest of I;
      addnl. details are given in the claims. For II: QV = (CZ2)y; QVI =
      (CZ2)z; y and z = 0-4; the bridged diazaspirocyclic ring contains 8-13
      members; the rest of the variables are defined similarly to those for I.
      2004:41475 CAPLUS
AN
      140:111404
DN
      Preparation of N-aryl diazaspirocyclic compounds as nicotinic cholinergic
TT
      receptor modulators for treating nervous system and other disorders
     Bhatti, Balwinder S.; Miller, Craig H.; Schmidt, Jeffrey D.
IN
      Targacept, Inc., USA
PΑ
SO
      PCT Int. Appl., 101 pp.
     CODEN: PIXXD2
DT
      Patent
      English
T.A
FAN.CNT 1
      PATENT NO.
                             KIND
                                     DATE
                                                   APPLICATION NO.
                                                                               DATE
                             ----
                                                   ______
                                     -----
PΙ
     WO 2004005293
                             A2
                                     20040115
                                                   WO 2003-US20524
                                                                               20030627
     WO 2004005293
                             Α3
                                     20040513
          W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN,
               CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH,
               GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, SD, SE, SG, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM
          RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PT, RO, SE, SI, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG
      US 2004067930
                             A1 20040408
                                                   US 2003-607930
                                                                               20030627
PRAI US 2002-394337P
                                     20020705
     MARPAT 140:111404
      646055-65-4P, 1-(3-Pyridyl)-1,7-diazaspiro[4.4] nonane
     RL: PAC (Pharmacological activity); RCT (Reactant); SPN (Synthetic
     preparation); THU (Therapeutic use); BIOL (Biological study); PREP
      (Preparation); RACT (Reactant or reagent); USES (Uses)
         (drug candidate; preparation of N-aryl diazaspirocyclic compds. as nicotinic
         cholinergic receptor modulators for treating nervous system and other
         disorders)
RN
      646055-65-4 CAPLUS
CN
      1,7-Diazaspiro[4.4]nonane, 1-(3-pyridinyl)- (9CI) (CA INDEX NAME)
```

IT **646055-61-0P**, 1-(3-Pyridyl)-1,7-diazaspiro[4.4] nonane

RN

CN

dihydrochloride 646056-36-2P, 7-Methyl-1-(3-pyridyl)-1,7diazaspiro[4.4] nonane
RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU
(Therapeutic use); BIOL (Biological study); PREP (Preparation); USES
(Uses)
 (drug candidate; preparation of N-aryl diazaspirocyclic compds. as nicotinic cholinergic receptor modulators for treating nervous system and other disorders)
646055-61-0 CAPLUS
1,7-Diazaspiro[4.4] nonane, 1-(3-pyridinyl)-, dihydrochloride (9CI) (CA INDEX NAME)

### •2 HCl

RN 646056-36-2 CAPLUS CN 1,7-Diazaspiro[4.4]nonane, 7-methyl-1-(3-pyridinyl)- (9CI) (CA INDEX NAME)

| => file registry COST IN U.S. DOLLARS      | SINCE FILE<br>ENTRY | TOTAL<br>SESSION |
|--|---------------------|------------------|
| FULL ESTIMATED COST                        | 5.64                | 161.27           |
| DISCOUNT AMOUNTS (FOR QUALIFYING ACCOUNTS) | SINCE FILE<br>ENTRY | TOTAL<br>SESSION |
| CA SUBSCRIBER PRICE                        | -0.70               | -0.70            |

FILE 'REGISTRY' ENTERED AT 15:13:48 ON 22 SEP 2004 USE IS SUBJECT TO THE TERMS OF YOUR STN CUSTOMER AGREEMENT. PLEASE SEE "HELP USAGETERMS" FOR DETAILS. COPYRIGHT (C) 2004 American Chemical Society (ACS)

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STRUCTURE FILE UPDATES: 21 SEP 2004 HIGHEST RN 749178-43-6 DICTIONARY FILE UPDATES: 21 SEP 2004 HIGHEST RN 749178-43-6

TSCA INFORMATION NOW CURRENT THROUGH MAY 21, 2004

Please note that search-term pricing does apply when conducting SmartSELECT searches.

Crossover limits have been increased. See HELP CROSSOVER for details.

Experimental and calculated property data are now available. For more information enter HELP PROP at an arrow prompt in the file or refer to the file summary sheet on the web at: http://www.cas.org/ONLINE/DBSS/registryss.html

Uploading C:\Stnexp4 corrupted\QUERIES\10607930.str

15 14 2

N

16 13 4

8 9

18 6

18 10

ring nodes :

1 2 3 4 5 6 7 8 9 10 13 14 15 16 17

ring bonds :

1-4 1-2 1-13 1-14 2-3 3-4 5-6 5-10 6-7 7-8 8-9 9-10 13-16 14-15 15-17

16-17

exact/norm bonds :

1-4 1-2 1-13 1-14 2-3 3-4 13-16 14-15 15-17 16-17

normalized bonds :

5-6 5-10 6-7 7-8 8-9 9-10

G1:C,N

Match level :

1:Atom 2:Atom 3:Atom 4:Atom 5:Atom 6:Atom 7:Atom 8:Atom 9:Atom 10:Atom 13:Atom 14:Atom 15:Atom 16:Atom 17:Atom 18:CLASS

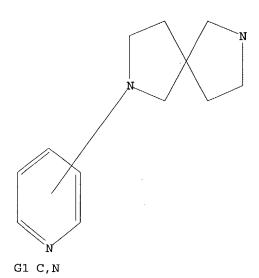
L5STRUCTURE UPLOADED

=> d 15

L5 HAS NO ANSWERS

L5

STR



Structure attributes must be viewed using STN Express query preparation.

=> s 15

SAMPLE SEARCH INITIATED 15:14:06 FILE 'REGISTRY' SAMPLE SCREEN SEARCH COMPLETED - 44 TO ITERATE

100.0% PROCESSED 44 ITERATIONS 2 ANSWERS

SEARCH TIME: 00.00.01

FULL FILE PROJECTIONS: ONLINE \*\*COMPLETE\*\*

10607930

BATCH \*\*COMPLETE\*\*

PROJECTED ITERATIONS:

483 TO 1277

PROJECTED ANSWERS:

2 TO 124

L6

2 SEA SSS SAM L5

=> s 15 ful

FULL SEARCH INITIATED 15:14:15 FILE 'REGISTRY'
FULL SCREEN SEARCH COMPLETED - 881 TO ITERATE

100.0% PROCESSED 881 ITERATIONS

19 ANSWERS

SEARCH TIME: 00.00.01

L7

19 SEA SSS FUL L5

=> file caplus

COST IN U.S. DOLLARS

SINCE FILE TOTAL ENTRY SESSION

ENTRY

FULL ESTIMATED COST

155.42 316.69

DISCOUNT AMOUNTS (FOR QUALIFYING ACCOUNTS)

SINCE FILE ' TOTAL

ENTRY 0.00 SESSION -0.70

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FILE COVERS 1907 - 22 Sep 2004 VOL 141 ISS 13 FILE LAST UPDATED: 21 Sep 2004 (20040921/ED)

This file contains CAS Registry Numbers for easy and accurate substance identification.

=> s 17

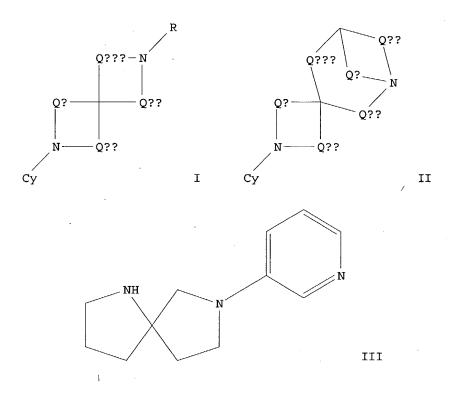
 $\Gamma$ 8

8 L7

=> d abs bib fhitstr 1-8

L8 ANSWER 1 OF 8 CAPLUS COPYRIGHT 2004 ACS on STN GI

AB



Compds., pharmaceutical compns. including the compds., and methods of preparation and use thereof are disclosed. The compds. are N-aryl diazaspirocyclic compds. (shown as I and II; variables defined below; e.g. III), bridged analogs of N-heteroaryl diazaspirocyclic compds., or prodrugs or metabolites of these compds. The aryl group can be a five or six-membered heterocyclic ring (heteroaryl). The compds. and compns. can be used to treat and/or prevent a wide variety of conditions or disorders, particularly those disorders characterized by dysfunction of nicotinic cholinergic neurotransmission, including disorders involving neuromodulation of neurotransmitter release, such as dopamine release. CNS disorders, which were characterized by an alteration in normal neurotransmitter release, are another example of disorders that can be treated and/or prevented. The compds. and compns. can also be used to alleviate pain. The compds. can alter the number of nicotinic cholinergic receptors of the brain of the patient, exhibit neuroprotective effects and when employed in effective amts., not result in appreciable adverse side effects (e.g. side effects such as significant increases in blood pressure and heart rate, significant neq. effects upon the qastrointestinal tract, and significant effects upon skeletal muscle). For the  $\alpha 4\beta 2$ subtype, the Ki value for each of the examples of I was <1  $\mu$ M, indicating that I bind tightly to the receptor. Although the methods of preparation are not claimed, 13 example prepns. are included. For example, III was prepared in 5 steps (76, 93, 96, 66 and 88 % yields, resp.) starting from Et (S)-N-benzylpyrrolidine-2-carboxylate and nitroethylene and involving intermediates Et 2-(2-nitroethyl)-1-benzylpyrrolidine-2carboxylate, 6-benzyl-2,6-diazaspiro[4.4]nonan-1-one, 1-benzyl-1,7diazaspiro[4.4]nonane and 1-benzyl-7-(3-pyridyl)-1,7diazaspiro[4.4] nonane. For I: Q1 is (CZ2)u; QII is (CZ2)v; QIII is (CZ2)w; and QIV is (CZ2)x; u, v, w and x are individually 0-4, preferably 0-3; R is H, lower alkyl, acyl, alkoxycarbonyl or aryloxycarbonyl; Z is H

```
and (un) substituted alkyl, cycloalkyl, heterocyclyl, aryl, alkylaryl,
     arylalkyl; Cy is a six membered ring linked via C to the N of the rest of
     I and each of the remaining ring atoms = N, N bonded to O or C bonded to a
     substituent species, wherein ≤3 are N or N bonded to O, or Cy is a
     five 5-membered heteroarom. ring linked via C to the N of the rest of I;
     addnl. details are given in the claims. For II: QV = (CZ2)y; QVI =
      (CZ2) z; y and z = 0-4; the bridged diazaspirocyclic ring contains 8-13
     members; the rest of the variables are defined similarly to those for I.
AN
     2004:41475 CAPLUS
DN
     140:111404
ΤI
     Preparation of N-aryl diazaspirocyclic compounds as nicotinic cholinergic
     receptor modulators for treating nervous system and other disorders
     Bhatti, Balwinder S.; Miller, Craig H.; Schmidt, Jeffrey D.
IN
PΑ
     Targacept, Inc., USA
     PCT Int. Appl., 101 pp.
SO
     CODEN: PIXXD2
DT
     Patent
LA
     English
FAN.CNT 1
     PATENT NO.
                            KIND
                                    DATE
                                                 APPLICATION NO.
                                                                            DATE
PΙ
     WO 2004005293
                             A2
                                    20040115
                                                 WO 2003-US20524
                                                                            20030627
     WO 2004005293
                             Α3
                                    20040513
          PL, PT, SD, SE, SG, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM

RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PT, RO, SE, SI, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG
     US 2004067930
                             Α1
                                    20040408
                                                 US 2003-607930
                                                                            20030627
PRAI US 2002-394337P
                             Ρ
                                    20020705
OS
     MARPAT 140:111404
IT
     646056-44-2P, 2-(3-Pyridyl)-2,7-diazaspiro[4.4] nonane
     RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU
      (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES
      (Uses)
         (drug candidate; preparation of N-aryl diazaspirocyclic compds. as nicotinic
         cholinergic receptor modulators for treating nervous system and other
         disorders)
     646056-44-2 CAPLUS
RN
CN
     2,7-Diazaspiro[4.4] nonane, 2-(3-pyridinyl)- (9CI) (CA INDEX NAME)
```

L8 ANSWER 2 OF 8 CAPLUS COPYRIGHT 2004 ACS on STN GI

Title compds. [I; R1, R2 = H, (substituted) alkyl, alkenyl, alkynyl, AB cycloalkylalkyl, aralkyl, etc.; R1R2N = 4-11 membered (bridged) (substituted) heterocyclyl; R3, R4 = H, halo, (substituted) alkyl, alkenyl, alkynyl, perfluoroalkyl, cycloalkyl, cycloalkylalkyl, aryl, aralkyl, heteroaralkyl, OR7, N(R7)2, cyano, etc.; R3R4 = atoms to form 5-7 membered (substituted) ring; R5 = H, halo, alkyl, perfluoroalkyl, OR7, N(R7)2; R6 = (CH2)nR7, (CH2)nCN, (CH2)nCO2R7, (CH2)nOR7, (CH2)nN(R7)2, etc.; R7 = H, alkyl, aryl, heteroaryl, cycloalkyl, aralkyl, aralkenyl, cycloalkylalkenyl, etc.; n = 0-5], were prepared for the treatment or prevention of obesity, eating disorders, osteoarthritis, cancer, AIDS wasting, cachexia, frailty, mental disorders, stress, cognitive disorders, sexual function, reproductive function, kidney function, locomotor disorders, attention deficit disorder (ADD), substance abuse disorders and dyskinesias, Huntington's disease, epilepsy, memory function, and spinal muscular atrophy. Thus, 2-piperidin-1-ylquinolin-6-amine and (2E)-3-(4-chlorophenyl)prop-2-enoyl chloride were stirred 3 h in HOAc to give (2E)-3-(4-chlorophenyl)-N-(2-piperidin-1-ylquinolin-6-yl)prop-2enamide hydrochloride. I bound to MCH-1R receptors with IC50 = 0.1-10000 nM.

AN 2003:434303 CAPLUS

DN 139:36445

TI Preparation of 2-aminoquinolines as melanin concentrating hormone receptor (MCH-1R) antagonists.

IN Devita, Robert J.; Chang, Lehua; Chaung, Danny; Hoang, Myle; Jiang,
Jinlong; Lin, Peter; Sailer, Andreas W.; Young, Jonathan R.

PA Merck & Co., Inc., USA

SO PCT Int. Appl., 178 pp. CODEN: PIXXD2

DT Patent

LA English

FAN.CNT 1

|    | PATENT NO.      |     |     |     |     | KIND DATE   |             |     | APPLICATION NO. |     |      |     |     |          | DATE     |     |     |     |  |
|----|-----------------|-----|-----|-----|-----|-------------|-------------|-----|-----------------|-----|------|-----|-----|----------|----------|-----|-----|-----|--|
|    |                 |     |     |     |     |             |             |     |                 |     |      |     |     |          |          |     |     |     |  |
| ΡI | I WO 2003045313 |     |     | A2  |     | 20030605    |             |     | WO 2002-US37556 |     |      |     |     | 20021122 |          |     |     |     |  |
|    | WO 2003045313   |     |     |     |     | A3          | A3 20030904 |     |                 |     |      |     |     |          |          |     |     |     |  |
|    |                 | W:  | ΑE, | AG, | AL, | AM,         | ΑT,         | ΑU, | ΑZ,             | ВA, | BB,  | BG, | BR, | BY,      | ΒZ,      | CA, | CH, | CN, |  |
|    |                 |     | CO, | CR, | CU, | CZ,         | DΕ,         | DK, | DM,             | DZ, | EC,  | EE, | ES, | FI,      | GB,      | GD, | GE, | GH, |  |
|    |                 |     | GM, | HR, | HU, | ID,         | IL,         | IN, | IS,             | JP, | KE,  | KG, | KR, | KZ,      | LC,      | LK, | LR, | LS, |  |
|    |                 |     |     |     |     |             |             | MG, |                 |     |      |     |     |          |          |     |     |     |  |
|    |                 |     | PΤ, | RO, | RU, | SC,         | SD,         | SE, | SG,             | SI, | SK,  | SL, | TJ, | TM,      | TN,      | TR, | TT, | TZ, |  |
|    |                 |     | UA, | UG, | US, | UΖ,         | VC,         | VN, | YU,             | ZA, | ZM,  | ZW, | AM, | ΑZ,      | BY,      | KG, | ΚZ, | MD, |  |
|    |                 |     | RU, | ТJ, | TM  |             |             |     |                 |     |      |     |     |          |          |     |     |     |  |
|    |                 | RW: | GH, | GM, | ΚE, | LS,         | MW,         | MZ, | SD,             | SL, | SZ,  | TZ, | UG, | ZM,      | ZW,      | ΑT, | BE, | BG, |  |
|    |                 |     | CH, | CY, | CZ, | DE,         | DK,         | EE, | ES,             | FI, | FR,  | GB, | GR, | ΙE,      | ΙΤ,      | LU, | MC, | NL, |  |
|    |                 |     | PT, | SE, | SK, | TR,         | BF,         | ВJ, | CF,             | CG, | CI,  | CM, | GA, | GN,      | GQ,      | GW, | ML, | MR, |  |
|    |                 |     | ΝE, | SN, | TD, | TG          |             |     |                 |     |      |     |     |          |          |     |     |     |  |
|    | EP 1450801      |     |     |     | A2  | A2 20040901 |             |     | EP 2002-789837  |     |      |     |     |          | 20021122 |     |     |     |  |
|    |                 | R:  | ΑT, | BE, | CH, | DE,         | DK,         | ES, | FR,             | GB, | .GR, | IT, | LI, | LU,      | NL,      | SE, | MC, | PT, |  |

IE, SI, LT, LV, FI, RO, MK, CY, AL, TR, BG, CZ, EE, SK

PRAI US 2001-333581P P 20011127

WO 2002-US37556 W 20021122

OS MARPAT 139:36445

IT 539852-73-8P, N-[2-(7-Methyl-2,7-diazaspiro[4.4]non-2-yl)quinolin-6-yl]-3-[4-(trifluoromethyl)phenyl]propanamide

RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(claimed compound; preparation of 2-aminoquinolines as melanin concentrating hormone

receptor (MCH-1R) antagonists)

RN 539852-73-8 CAPLUS

CN Benzenepropanamide, N-[2-(7-methyl-2,7-diazaspiro[4.4]non-2-yl)-6-quinolinyl]-4-(trifluoromethyl)- (9CI) (CA INDEX NAME)

$$\begin{array}{c} O \\ NH-C-CH_2-CH_2 \end{array}$$

L8 ANSWER 3 OF 8 CAPLUS COPYRIGHT 2004 ACS on STN

AB The errors were not reflected in the abstract or the index entries.

AN 1995:2483 CAPLUS

DN 123:164953

TI Anti-mycobacterium avium activity of quinolones: in vitro activities.
[Erratum to document cited in CA120:27300f]

AU Klopman, Gilles; Wang, Shaomeng; Jacobs, Michael R.; Bajaksouzian, Saralee; Edmonds, Kay; Ellner, Jerrold J.

CS Chem. Dep., Case West. Reserve Univ., Cleveland, OH, 44106, USA

SO Antimicrobial Agents and Chemotherapy (1993), 37(12), 2766 CODEN: AMACCQ; ISSN: 0066-4804

DT Journal

LA English

IT 91188-27-1

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(Mycobacterium avium sensitivity to (Erratum))

RN 91188-27-1 CAPLUS

CN 1,8-Naphthyridine-3-carboxylic acid, 1-ethyl-6-fluoro-1,4-dihydro-7-(7-methyl-2,7-diazaspiro[4.4]non-2-yl)-4-oxo- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} & \text{Et} & \text{Me} \\ \hline \\ \text{N} & \text{N} & \\ \\ \text{N} & \text{F} \end{array}$$

L8ANSWER 4 OF 8 CAPLUS COPYRIGHT 2004 ACS on STN

AB The MICs of 88 quinolones against 14 selected reference and clin. strains of Mycobacterium avium-M. intracellulare complex were determined Agents tested included ciprofloxacin, sparfloxacin (PD 131501), and 86 other exptl. quinolones. Test strains were selected to represent various susceptibilities to ciprofloxacin and other drug resistance profiles. MICs were determined by the microdilution method in 7HSF broth, with incubation for 14 days at 35°. The results showed 25 of the quinolones to be active against the strains, with MICs for 90% of the strains (MIC90s) of 2 to 32  $\mu g/mL$ . Ten of these compds. had activities equivalent to or greater than that of ciprofloxacin. The most active compound was PD 125354, with an MIC50 of 0.5 μg/mL and an MIC90 of 2 μg/mL; comparable values for ciprofloxacin were 4 and 8  $\mu g/mL$ , resp. The next most active compds., with MIC90s of 4 µg/mL, were sparfloxacin (PD 131501), PD 123982, PD 135144, and PD 119421. MIC90s of PD 131575, PD 126889, PD 122642, PD 139586, and PD 143289 were 8  $\mu$ g/mL. Further evaluation of the most active agents is warranted, as is assessment of structure-activity relationships of active and inactive agents to elucidate the active portions of the compds. and to lead to the development of compds. with enhanced activity.

ΑN 1994:27300 CAPLUS

120:27300 DN

TΙ Anti-mycobacterium avium activity of quinolones: in vitro activities

ΑU Klopman, Gilles; Wang, Shaomeng; Jacobs, Michael R.; Bajaksouzian, Saralee; Edmonds, Kay; Ellner, Jerrold J. Chem. Dep., Case West. Reserve Univ., Cleveland, OH, 44106, USA

CS

SO Antimicrobial Agents and Chemotherapy (1993), 37(9), 1799-806 CODEN: AMACCQ; ISSN: 0066-4804

DTJournal

LA English

TТ 91188-27-1

> RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); BIOL (Biological study)

(Mycobacterium avium sensitivity to)

RN91188-27-1 CAPLUS

CN1,8-Naphthyridine-3-carboxylic acid, 1-ethyl-6-fluoro-1,4-dihydro-7-(7methyl-2,7-diazaspiro[4.4]non-2-yl)-4-oxo- (9CI) (CA INDEX NAME)

L8 ANSWER 5 OF 8 CAPLUS COPYRIGHT 2004 ACS on STN GI

Fluoroquinolone antibacterials having the 7-position (10-position of pyridobenzoxazines) substituted with 2,7-diazaspiro[4.4]nonane, 1,7-diazaspiro[4.4]nonane, or 2,8-diazaspiro[5.5]undecane (e.g. I (X = CF, CH, N) were prepared and their biol. activities were compared with piperazine and pyrrolidine substituted analogs. Most exhibited potent Gram-pos. and Gram-neg. activity, especially when side chain was N-alkylated. Thus, the quinolinecarboxylic acid II was treated with 2-methyl-2,7-diazaspiro[4.4]nonane to give I (X = CH).

AN 1990:497432 CAPLUS

DN 113:97432

TI Quinolone antibacterial agents substituted at the 7-position with spiroamines. Synthesis and structure-activity relationships

AU Culbertson, Townley P.; Sanchez, Joseph P.; Gambino, Laura; Sesnie, Josephine A.

CS Parke-Davis Pharm. Res. Div., Warner-Lambert Co., Ann Arbor, MI, 48105, USA

SO Journal of Medicinal Chemistry (1990), 33(8), 2270-5 CODEN: JMCMAR; ISSN: 0022-2623

DT Journal

LA English

OS CASREACT 113:97432

IT 91188-27-1P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation)

(preparation and bactericidal activity of)

RN 91188-27-1 CAPLUS

CN 1,8-Naphthyridine-3-carboxylic acid, 1-ethyl-6-fluoro-1,4-dihydro-7-(7-methyl-2,7-diazaspiro[4.4]non-2-yl)-4-oxo- (9CI) (CA INDEX NAME)

L8 ANSWER 6 OF 8 CAPLUS COPYRIGHT 2004 ACS on STN GI

AB The title compds. [I; A = N, CR9; R1 = Me, Et, cyclopropyl, etc.; R2 = H, alkyl, (5-methyl-2-oxo-1,3-dioxol-4-yl)methyl; R3 = Me, 13 N-attached heterocyclyl; R9 = H, halo, Me, cyano, NO2; R1R9 = OCH2CHMe, SCH2CHMe, CH2CH2CHMe] were prepared C6F5COCH2CO2Et (preparation given) was refluxed 2 h with HC(OEt)3 in Ac2O to give C6F5COC(CO2Et):CHOEt which was treated overnight with cyclopropylamine in EtOH to give C6F5COC(CO2Et):CHNHR (R = cyclopropyl). The latter was refluxed 3 h in DMF containing NaF to give, after saponification, quinolonecarboxylate II (R3 = Y = F) which was refluxed 3 h

with 1-methylpiperazine in MeCN/DMF containing Dabco to give II (R3 = 4-methyl-1-piperazinyl, Y = F) (III). Tablets were prepared each containing

111
583.0, cellulose 55.0, starch 72.0, polyvinylpyrrolidone 30.0, SiO2 5.0,
and Mg stearate 5.0 mg with a coating comprising
 (hydroxypropyl)methylcellulose 6.0, Macrogol 40,000 2.0, and TiO2 2.0 mg.
II (R3 = 3-methyl-1-piperazinyl, Y = NH2) had a min. inhibitory concentration

0.5 (units not given) against Escherichia coli 455/7.

AN 1989:114697 CAPLUS

DN 110:114697

of

TI Preparation of 5-substituted quinolone- and naphthyridonecarboxylic acids as antibacterial agents

IN Petersen, Uwe; Grohe, Klaus; Schriewer, Michael; Schenke, Thomas; Haller, Ingo; Metzger, Karl; Endermann, Rainer; Zeiler, Hans Joachim

PA Bayer A.-G., Fed. Rep. Ger.

SO Ger. Offen., 32 pp.

CODEN: GWXXBX

DT Patent

LA German

FAN.CNT 1

| T 1214 . | CIAI | _      |      |     |     |            |     |       |      |       |         |      |     |          |       |     |
|----------|------|--------|------|-----|-----|------------|-----|-------|------|-------|---------|------|-----|----------|-------|-----|
|          | PAT  | CENT 1 | NO.  |     |     | KIND       | )   | DATE  |      | API   | PLICAT  | CION | NO. |          | DATE  |     |
|          |      |        |      |     |     |            |     |       |      |       | <b></b> |      |     | <b>-</b> |       |     |
| ΡI       | DE   | 3711   | 193  |     |     | A1         |     | 1988  | 1013 | DE    | 1987-   | 3711 | 193 |          | 19870 | 402 |
|          | NO   | 8801   | 121  |     |     | Α          |     | 1988  | 1003 | NO    | 1988-   | 1121 |     |          | 19880 | 314 |
|          | ΕP   | 2849   | 35   |     |     | A1         |     | 1988  | 1005 | EP    | 1988-   | 1044 | 52  |          | 19880 | 321 |
|          |      | R:     | ΑT,  | BE, | CH, | DE,        | ES, | , FR, | GB,  | GR, I | r, LI,  | NL,  | SE  |          |       |     |
|          | AU   | 8813   | 811  |     |     | <b>A</b> 1 |     | 1988  | 1006 | AU    | 1988-   | 1381 | 1   |          | 19880 | 328 |
|          | DD   | 2740   | 29   |     |     | A5         |     | 1989  | 1206 | DD    | 1988-   | 3141 | 59  |          | 19880 | 329 |
|          | DK   | 8801   | 802  |     |     | A          |     | 1988  | 1003 | DK    | 1988-   | 1802 |     |          | 19880 | 330 |
|          | FI   | 8801   | 501  |     |     | Α          |     | 1988  | 1003 | FI    | 1988-   | 1501 |     |          | 19880 | 330 |
|          | CN   | 8810   | 1741 |     |     | Α          |     | 1988  | 1116 | CN    | 1988-   | 1017 | 41  |          | 19880 | 331 |

|        | ZA | 8802318      | A  | 19881228 | $z_{A}$ | 1988-2318  | 19880331 |
|--------|----|--------------|----|----------|---------|------------|----------|
|        | JP | 63258855     | A2 | 19881026 | JP      | 1988-78298 | 19880401 |
|        | HU | 47098        | A2 | 19890130 | HU      | 1988-1619  | 19880401 |
|        | HU | 201050       | В  | 19900928 |         |            |          |
| DD A T | שת | 1987-3711193 |    | 19970402 |         |            |          |

DE 1987-3711193

OS CASREACT 110:114697; MARPAT 110:114697

IT119354-28-8P

> RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses) (preparation of, as antibacterial agent)

RN 119354-28-8 CAPLUS

CN 1,8-Naphthyridine-3-carboxylic acid, 5-amino-1-ethyl-6-fluoro-1,4-dihydro-7-(7-methyl-2,7-diazaspiro[4.4]non-2-yl)-4-oxo-(9CI) (CA INDEX NAME)

$$\begin{array}{c|c} & \text{Et} & \text{Me} \\ \hline \\ \text{N} & \text{N} & \text{N} \\ \hline \\ \text{N} & \text{N} & \text{N} \\ \hline \\ \text{O} & \text{NH}_2 \\ \end{array}$$

L8ANSWER 7 OF 8 CAPLUS COPYRIGHT 2004 ACS on STN GΙ

The title compds. (I; X = FC, N; R1 = H, alkyl, cation; R2 = amino, heterocyclyl) were prepared Thus, 2,3,4,5-F4C6HCO2H was converted to its AΒ acid chloride and condensed with Et02CCH2CO2H to give 2,3,4,5-F4C6HCOCH2CO2H. This was cyclocondensed with (EtO)3CH and cyclopropylamine to give I (X = FC, R1 = H, R2 = F). The latter was treated with 3-pyrrolidinemethanamine to give 7-[3-(aminomethyl)-1pyrrolidinyl]-3-quinolinecarboxylic acid derivative II. II had a min. inhibitory concentration of <0.1 μg/mL against, e.g., Escherichia coli Vogel. ΑN

1986:34013 CAPLUS

DN 104:34013

TI 7-Substituted-1-cyclopropyl-6,8-difluoro-1,4-dihydro-4-oxo-3quinolinecarboxylic acids; 7-substituted-1-cyclopropyl-1,4-dihydro-6fluoro-4-oxo-1,8-naphthyridine-3-carboxylic acids and their derivatives Culbertson, Townley P.; Mich, Thomas F.; Domagala, John M.; Nichols, IN

Jeffrey B. Warner-Lambert Co. , USA PAEur. Pat. Appl., 137 pp. SO CODEN: EPXXDW DTPatent LA English FAN.CNT 3 PATENT NO. KIND DATE APPLICATION NO. DATE \_ \_ \_ \_ PΙ EP 153163 A2 19850828 EP 1985-301009 19850215 EP 153163 A3 19860129 В1 EP 153163 19891227. R: AT, BE, CH, DE, FR, GB, IT, LI, LU, NL, SE US 4665079 19870512 US 1985-692820 Α 19850123 ZA 8500854 19860924 ZA 1985-854 Α 19850204 CA 1289956 A1 19911001 CA 1985-473502 19850204 IL 74286 19880731 IL 1985-74286 Α1 19850208 AU 8538618 **A1** 19850822 AU 1985-38618 19850211 AU 568004 B2 19871210 DK 8500687 Α 19850818 DK 1985-687 19850214 DK 161889 В 19910826 DK 161889 C 19920203 FI 8500631 Α 19850818 FI 1985-631 19850215 FI 83312 В 19910315 FI 83312 С 19910625 NO 8500614 Α 19850819 NO 1985-614 19850215 NO 161370 В 19890502 NO 161370 C 19890809 JP 60214773 A2 19851028 JP 1985-26669 19850215 JP 07055945 B4 19950614 HU 37149 0 19851128 HU 1985-580 19850215 ES 540441 A1 19870501 ES 1985-540441 19850215 AT 48997 E 19900115 AT 1985-301009 19850215 JP 07173160 JP 1994-278595 Α2 19950711 19941019 PRAI US 1984-581157 19840217 US 1985-692820 19850123 US 1982-416406 19820909 US 1983-522275 19830812 IL 1983-69601 19830830 EP 1985-301009 19850215 os CASREACT 104:34013 IT 91188-24-8P RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses) (preparation of, as bactericide) RN91188-24-8 CAPLUS CN1,8-Naphthyridine-3-carboxylic acid, 7-(2,7-diazaspiro[4.4]non-2-yl)-1ethyl-6-fluoro-1,4-dihydro-4-oxo- (9CI) (CA INDEX NAME)

# L8 ANSWER 8 OF 8 CAPLUS COPYRIGHT 2004 ACS on STN GI

$$\begin{array}{c|c}
R & CO_2R^3 \\
R^1 & Z & N \\
R^2 & I
\end{array}$$

AB Title compds. I and II [R = H, halo; R1 = (un)substituted N heterocycle; R2 = alkyl, haloalkyl, hydroxyalkyl, cycloalkyl, vinyl; R3 = H, alkyl, cation; R4, R5 = H, alkyl; Z = H, (un)substituted CH] were prepared Thus, II (R = R1 = F, R3 = R4 = H, R5 = Me) was treated with diazaspirononane III.2HCl, prepared from Et 3-(ethoxycarbonyl)-5-oxo-3-pyrrolidineacetate, to give II (R = 7-methyl-2,7-diazaspiro[4,4]non-2-yl), which had a min. inhibitory concentration against Staphylococcus aureus UC-76 of 0.006 μg/mL.

AN 1984:472740 CAPLUS

DN 101:72740

TI Antibacterial agents

IN Culbertson, Townley P.; Mich, Thomas F.; Domagala, John M.; Nichols, Jeffrey B.

PA Warner-Lambert Co. , USA

SO Eur. Pat. Appl., 125 pp.

CODEN: EPXXDW

DT Patent

LA English

FAN.CNT 3

|    | PATENT NO.     | KIND   | DATE         | APPLICATION NO. | DATE     |
|----|----------------|--------|--------------|-----------------|----------|
|    | - <b></b>      |        |              |                 |          |
| ΡI | EP 106489      | A2     | 19840425     | EP 1983-305148  | 19830906 |
|    | EP 106489      | A3     | 19850424     |                 |          |
|    | EP 106489      | B1     | 19880727     |                 |          |
|    | R: AT, BE, CH, | DE, FR | , GB, IT, LI | , LU, NL, SE    |          |
|    | ZA 8306357     | Α      | 19840425     | ZA 1983-6357    | 19830826 |
|    | IL 69601       | A1     | 19870831     | IL 1983-69601   | 19830830 |
|    | IL 80848       | A1     | 19880930     | IL 1983-80848   | 19830830 |
|    | IL 80849       | A1     | 19881031     | IL 1983-80849   | 19830830 |
|    | FI 8303151     | A      | 19840310     | FI 1983-3151    | 19830905 |

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FI 83513
                           В
                                 19910415
                                  19910725
     FI 83513
                           C
     AU 8318698
                                  19840315
                                                                       19830905
                           Α1
                                              AU 1983-18698
     AU 562286
                           B2
                                  19870604
     AT 35987
                                              AT 1983-305148
                                                                       19830906
                           E
                                  19880815
     CS 246065
                           B2
                                  19861016
                                              CS 1983-6498
                                                                       19830907
     DK 8304074
                                              DK 1983-4074
                           Α
                                  19840310
                                                                       19830908
     DK 171098
                           R1
                                  19960603
     NO 8303206
                                  19840312
                                              NO 1983-3206
                                                                       19830908
                           Δ
     NO 164418
                                  19900625
                           B
     NO 164418
                           C.
                                  19901003
                                              JP 1983-164271
     JP 59067269
                           A2
                                  19840416
                                                                       19830908
     JP 07042284
                           B4
                                  19950510
     HU 31718
                           0
                                  19840528
                                              HU 1983-3140
                                                                       19830908
     HU 196986
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                                  19890228
     DD 216010
                           Α5
                                  19841128
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                                                                       19830908
     ES 525493
                           A1
                                  19850116
                                              ES 1983-525493
                                                                       19830908
     SU 1360584
                           Α3
                                  19871215
                                              SU 1983-3659624
                                                                       19831103
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                           Α1
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                                                                       19840222
     ES 529936
                           Α1
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                                  19850616
                                              ES 1984-529937
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     ES 529935
                           Α1
                                  19850701
                                              ES 1984-529935
                                                                       19840222
     ES 529933
                           Α1
                                  19851016
                                              ES 1984-529933
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                           Α3
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                                                                       19840427
     SU 1314954
                                  19870530
                           A3
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                                                                       19840503
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                                              CS 1984-4630
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     CS 246084
                           B2
                                  19861016
                                              CS 1984-4631
                                                                       19840618
     CS 247180
                           B2
                                  19861218
                                              CS 1984-4632
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     JP 01146880
                           A2
                                  19890608
                                              JP 1988-282640
                                                                       19881110
     JP 04210961
                                  19920803
                           A2
                                              JP 1991-53587
                                                                       19910227
     JP 06062561
                           B4
                                  19940817
     JP 07070111
                           A2
                                  19950314
                                              JP 1994-32109
                                                                       19940302
     JP 07080770
                           B4
                                  19950830
     DK 9400700
                           А
                                 19940616
                                              DK 1994-70094
                                                                       19940616
     DK 170471
                           B1
                                  19950911
                                              DK 1994-700
                                                                       19940616
                                  19961126
     JP 08311061
                           A2
                                              JP 1996-134697
                                                                       19960529
     JP 2704984
                           B2
                                  19980126
PRAI US 1982-416406
                                  19820909
     US 1983-522275
                                 19830812
     IL 1983-69601
                                 19830830
     EP 1983-305148
                                 19830906
     CS 1983-6498
                                 19830907
     JP 1983-164271
                                 19830908
TΤ
     91188-24-8P
     RL: BAC (Biological activity or effector, except adverse); BSU (Biological
     study, unclassified); SPN (Synthetic preparation); BIOL (Biological
     study); PREP (Preparation)
        (preparation and bactericidal activity of)
RN
     91188-24-8 CAPLUS
CN
     1,8-Naphthyridine-3-carboxylic acid, 7-(2,7-diazaspiro[4.4]non-2-yl)-1-
     ethyl-6-fluoro-1,4-dihydro-4-oxo- (9CI) (CA INDEX NAME)
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=> d abs bib hitstr 1-8

L8 ANSWER 1 OF 8 CAPLUS COPYRIGHT 2004 ACS on STN GI

AB Compds., pharmaceutical compns. including the compds., and methods of preparation and use thereof are disclosed. The compds. are N-aryl diazaspirocyclic compds. (shown as I and II; variables defined below; e.g. III), bridged analogs of N-heteroaryl diazaspirocyclic compds., or prodrugs or metabolites of these compds. The aryl group can be a five or six-membered heterocyclic ring (heteroaryl). The compds. and compns. can be used to treat and/or prevent a wide variety of conditions or disorders, particularly those disorders characterized by dysfunction of nicotinic cholinergic neurotransmission, including disorders involving

Blank Shoot (USPTO)

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neuromodulation of neurotransmitter release, such as dopamine release.
      CNS disorders, which were characterized by an alteration in normal
      neurotransmitter release, are another example of disorders that can be
      treated and/or prevented. The compds. and compns. can also be used to
      alleviate pain. The compds. can alter the number of nicotinic cholinergic
      receptors of the brain of the patient, exhibit neuroprotective effects and
      when employed in effective amts., not result in appreciable adverse side
      effects (e.g. side effects such as significant increases in blood pressure
      and heart rate, significant neg. effects upon the gastrointestinal tract,
      and significant effects upon skeletal muscle). For the \alpha 4\beta 2
      subtype, the Ki value for each of the examples of I was <1 \muM,
      indicating that I bind tightly to the receptor. Although the methods of
      preparation are not claimed, 13 example prepns. are included. For example, III
      was prepared in 5 steps (76, 93, 96, 66 and 88 % yields, resp.) starting
      from Et (S)-N-benzylpyrrolidine-2-carboxylate and nitroethylene and
      involving intermediates Et 2-(2-nitroethyl)-1-benzylpyrrolidine-2-
      carboxylate, 6-benzyl-2,6-diazaspiro[4.4]nonan-1-one, 1-benzyl-1,7-
      diazaspiro[4.4] nonane and 1-benzyl-7-(3-pyridyl)-1,7-
      diazaspiro[4.4] nonane. For I: Q1 is (CZ2)u; QII is (CZ2)v; QIII is
      (CZ2)w; and QIV is (CZ2)x; u, v, w and x are individually 0-4, preferably
      0-3; R is H, lower alkyl, acyl, alkoxycarbonyl or aryloxycarbonyl; Z is H
      and (un) substituted alkyl, cycloalkyl, heterocyclyl, aryl, alkylaryl,
      arylalkyl; Cy is a six membered ring linked via C to the N of the rest of
      I and each of the remaining ring atoms = N, N bonded to O or C bonded to a
      substituent species, wherein ≤3 are N or N bonded to O, or Cy is a
      five 5-membered heteroarom. ring linked via C to the N of the rest of I;
      addnl. details are given in the claims. For II: QV = (CZ2)y; QVI =
      (CZ2)z; y and z = 0-4; the bridged diazaspirocyclic ring contains 8-13
      members; the rest of the variables are defined similarly to those for I.
      2004:41475
                    CAPLUS
      140:111404
      Preparation of N-aryl diazaspirocyclic compounds as nicotinic cholinergic
      receptor modulators for treating nervous system and other disorders
      Bhatti, Balwinder S.; Miller, Craig H.; Schmidt, Jeffrey D.
      Targacept, Inc., USA
      PCT Int. Appl., 101 pp.
      CODEN: PIXXD2
      Patent
      English
FAN.CNT 1
      PATENT NO.
                              KIND
                                      DATE
                                                     APPLICATION NO.
                                                                                 DATE
                              ----
                                       <del>-</del> - - - - - - -
      WO 2004005293
                               A2
                                      20040115
                                                     WO 2003-US20524
                                                                                 20030627
      WO 2004005293
                               Α3
                                      20040513
          W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, SD, SE, SG, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM

RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PT, RO, SE, SI, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW MIL MR, NE, SN, TD, TG
               GW, ML, MR, NE, SN, TD, TG
     US 2004067930
                                      20040408
                               A1
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                                                                                 20030627
PRAI US 2002-394337P
                                      20020705
     MARPAT 140:111404
      646056-44-2P, 2-(3-Pyridyl)-2,7-diazaspiro[4.4]nonane
      646056-52-2P, 2-(5-Methoxy-3-pyridyl)-2,7-diazaspiro[4.4]nonane
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OS

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646056-53-3P, 2-[5-(Cyclopentyloxy)-3-pyridyl]-2,7-
     diazaspiro[4.4] nonane 646056-54-4P, 2-(5-Phenoxy-3-pyridyl)-2,7-
     diazaspiro[4.4] nonane 646056-55-5P, 2-[5-(4-Hydroxyphenoxy)-3-
     pyridyl] -2,7-diazaspiro[4.4] nonane 646056-56-6P,
     2-(5-Ethynyl-3-pyridyl)-2,7-diazaspiro[4.4]nonane 646056-57-7P,
     2-(6-Chloro-3-pyridyl)-2,7-diazaspiro[4.4]nonane 646056-59-9P,
     2-Methyl-7-(3-pyridyl)-2,7-diazaspiro[4.4] nonane 646056-60-2P,
     2-Methyl-7-(5-methoxy-3-pyridyl)-2,7-diazaspiro[4.4]nonane
     646056-61-3P, 2-Methyl-7-(5-phenoxy-3-pyridyl)-2,7-
     diazaspiro[4.4] nonane
     RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU
     (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES
     (Uses)
        (drug candidate; preparation of N-aryl diazaspirocyclic compds. as nicotinic
        cholinergic receptor modulators for treating nervous system and other
        disorders)
RN
     646056-44-2 CAPLUS
CN
     2,7-Diazaspiro[4.4]nonane, 2-(3-pyridinyl)- (9CI) (CA INDEX NAME)
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RN 646056-52-2 CAPLUS CN 2,7-Diazaspiro[4.4]nonane, 2-(5-methoxy-3-pyridinyl)- (9CI) (CA INDEX NAME)

RN 646056-53-3 CAPLUS CN 2,7-Diazaspiro[4.4]nonane, 2-[5-(cyclopentyloxy)-3-pyridinyl]- (9CI) (CA INDEX NAME)

RN 646056-54-4 CAPLUS

CN 2,7-Diazaspiro[4.4]nonane, 2-(5-phenoxy-3-pyridinyl)- (9CI) (CA INDEX NAME)

RN 646056-55-5 CAPLUS

CN Phenol, 4-[[5-(2,7-diazaspiro[4.4]non-2-yl)-3-pyridinyl]oxy]- (9CI) (CA INDEX NAME)

RN 646056-56-6 CAPLUS

CN 2,7-Diazaspiro[4.4]nonane, 2-(5-ethynyl-3-pyridinyl)- (9CI) (CA INDEX NAME)

RN 646056-57-7 CAPLUS

CN 2,7-Diazaspiro[4.4]nonane, 2-(6-chloro-3-pyridinyl)- (9CI) (CA INDEX NAME)

RN 646056-59-9 CAPLUS

CN 2,7-Diazaspiro[4.4]nonane, 2-methyl-7-(3-pyridinyl)- (9CI) (CA INDEX NAME)

RN 646056-60-2 CAPLUS

CN 2,7-Diazaspiro[4.4] nonane, 2-(5-methoxy-3-pyridinyl)-7-methyl- (9CI) (CA INDEX NAME)

RN 646056-61-3 CAPLUS

CN 2,7-Diazaspiro[4.4]nonane, 2-methyl-7-(5-phenoxy-3-pyridinyl)- (9CI) (CA INDEX NAME)

L8 ANSWER 2 OF 8 CAPLUS COPYRIGHT 2004 ACS on STN GI

$$\mathbb{R}^{6}$$
 $\mathbb{R}^{3}$ 
 $\mathbb{R}^{1}$ 
 $\mathbb{R}^{2}$ 
 $\mathbb{R}^{5}$ 

AB Title compds. [I; R1, R2 = H, (substituted) alkyl, alkenyl, alkynyl,

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cycloalkylalkyl, aralkyl, etc.; R1R2N = 4-11 membered (bridged)
     (substituted) heterocyclyl; R3, R4 = H, halo, (substituted) alkyl,
     alkenyl, alkynyl, perfluoroalkyl, cycloalkyl, cycloalkylalkyl, aryl,
     aralkyl, heteroaralkyl, OR7, N(R7)2, cyano, etc.; R3R4 = atoms to form 5-7 membered (substituted) ring; R5 = H, halo, alkyl, perfluoroalkyl, OR7,
     N(R7)2; R6 = (CH2)nR7, (CH2)nCN, (CH2)nCO2R7, (CH2)nOR7, (CH2)nN(R7)2,
     etc.; R7 = H, alkyl, aryl, heteroaryl, cycloalkyl, aralkyl, aralkenyl,
     cycloalkylalkenyl, etc.; n = 0-5], were prepared for the treatment or
     prevention of obesity, eating disorders, osteoarthritis, cancer, AIDS
     wasting, cachexia, frailty, mental disorders, stress, cognitive disorders,
     sexual function, reproductive function, kidney function, locomotor
     disorders, attention deficit disorder (ADD), substance abuse disorders and
     dyskinesias, Huntington's disease, epilepsy, memory function, and spinal
     muscular atrophy. Thus, 2-piperidin-1-ylquinolin-6-amine and
     (2E)-3-(4-chlorophenyl)prop-2-enoyl chloride were stirred 3 h in HOAc to
     give (2E)-3-(4-chlorophenyl)-N-(2-piperidin-1-ylquinolin-6-yl)prop-2-
     enamide hydrochloride. I bound to MCH-1R receptors with IC50 = 0.1-10000
     2003:434303 CAPLUS
     139:36445
     Preparation of 2-aminoquinolines as melanin concentrating hormone receptor
     (MCH-1R) antagonists.
     Devita, Robert J.; Chang, Lehua; Chaung, Danny; Hoang, Myle; Jiang,
     Jinlong; Lin, Peter; Sailer, Andreas W.; Young, Jonathan R.
     Merck & Co., Inc., USA
     PCT Int. Appl., 178 pp.
     CODEN: PIXXD2
     Patent
     English
FAN.CNT 1
     PATENT NO.
                         KIND
                                DATE
                                             APPLICATION NO.
                                                                     DATE
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                                                                     _____
                                             WO 2002-US37556
     WO 2003045313
                          A2
                                20030605
                                                                     20021122
     WO 2003045313
                                20030904
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             PT, RO, RU, SC, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ,
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             RU, TJ, TM
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             NE, SN, TD, TG
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             IE, SI, LT, LV, FI, RO, MK, CY, AL, TR, BG, CZ, EE, SK
PRAI US 2001-333581P
                          Р
                                20011127
     WO 2002-US37556
                          W
                                20021122
     MARPAT 139:36445
     539852-73-8P, N-[2-(7-Methyl-2,7-diazaspiro[4.4]non-2-yl)quinolin-
     6-yl]-3-[4-(trifluoromethyl)phenyl]propanamide 539852-75-0P,
     N-[2-(7-Benzyl-2,7-diazaspiro[4.4]non-2-yl)quinolin-6-yl]-3-[4-
     (trifluoromethyl)phenyl]propanamide 539852-77-2P,
     N-[2-(2,7-Diazaspiro[4.4]non-2-yl)quinolin-6-yl]-3-[4-
     (trifluoromethyl)phenyl]propanamide
     RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU
```

(Therapeutic use); BIOL (Biological study); PREP (Preparation); USES

(Uses)

(claimed compound; preparation of 2-aminoquinolines as melanin concentrating hormone

receptor (MCH-1R) antagonists)

RN 539852-73-8 CAPLUS

CN Benzenepropanamide, N-[2-(7-methyl-2,7-diazaspiro[4.4]non-2-yl)-6-quinolinyl]-4-(trifluoromethyl)- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} & & & \\ &$$

RN 539852-75-0 CAPLUS

CN Benzenepropanamide, N-[2-[7-(phenylmethyl)-2,7-diazaspiro[4.4]non-2-yl]-6-quinolinyl]-4-(trifluoromethyl)- (9CI) (CA INDEX NAME)

Ph-CH2

RN 539852-77-2 CAPLUS

CN Benzenepropanamide, N-[2-(2,7-diazaspiro[4.4]non-2-yl)-6-quinolinyl]-4-(trifluoromethyl)- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & & \\ & & \\ & & & \\ & &$$

L8 ANSWER 3 OF 8 CAPLUS COPYRIGHT 2004 ACS on STN

AB The errors were not reflected in the abstract or the index entries.

AN 1995:2483 CAPLUS

DN 123:164953

TI Anti-mycobacterium avium activity of quinolones: in vitro activities.
[Erratum to document cited in CA120:27300f]

AU Klopman, Gilles; Wang, Shaomeng; Jacobs, Michael R.; Bajaksouzian,

Saralee; Edmonds, Kay; Ellner, Jerrold J.

CS Chem. Dep., Case West. Reserve Univ., Cleveland, OH, 44106, USA

SO Antimicrobial Agents and Chemotherapy (1993), 37(12), 2766 CODEN: AMACCQ; ISSN: 0066-4804

DT Journal

LA English

IT 91188-27-1

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(Mycobacterium avium sensitivity to (Erratum))

RN 91188-27-1 CAPLUS

CN 1,8-Naphthyridine-3-carboxylic acid, 1-ethyl-6-fluoro-1,4-dihydro-7-(7-methyl-2,7-diazaspiro[4.4]non-2-yl)-4-oxo- (9CI) (CA INDEX NAME)

L8 ANSWER 4 OF 8 CAPLUS COPYRIGHT 2004 ACS on STN

The MICs of 88 quinolones against 14 selected reference and clin. strains of AΒ Mycobacterium avium-M. intracellulare complex were determined Agents tested included ciprofloxacin, sparfloxacin (PD 131501), and 86 other exptl. quinolones. Test strains were selected to represent various susceptibilities to ciprofloxacin and other drug resistance profiles. MICs were determined by the microdilution method in 7HSF broth, with incubation for 14 days at 35°. The results showed 25 of the quinolones to be active against the strains, with MICs for 90% of the strains (MIC90s) of 2 to 32  $\mu g/mL$ . Ten of these compds. had activities equivalent to or greater than that of ciprofloxacin. The most active compound was PD 125354, with an MIC50 of 0.5 μg/mL and an MIC90 of 2 μg/mL; comparable values for ciprofloxacin were 4 and 8 µg/mL, resp. The next most active compds., with MIC90s of 4  $\mu$ g/mL, were sparfloxacin (PD 131501), PD 123982, PD 135144, and PD 119421. MIC90s of PD 131575, PD 126889, PD 122642, PD 139586, and PD 143289 were 8  $\mu$ g/mL. Further evaluation of the most active agents is warranted, as is assessment of structure-activity relationships of active and inactive agents to elucidate the active portions of the compds. and to lead to the development of compds. with enhanced activity.

AN 1994:27300 CAPLUS

DN 120:27300

TI Anti-mycobacterium avium activity of quinolones: in vitro activities

AU Klopman, Gilles; Wang, Shaomeng; Jacobs, Michael R.; Bajaksouzian, Saralee; Edmonds, Kay; Ellner, Jerrold J.

CS Chem. Dep., Case West. Reserve Univ., Cleveland, OH, 44106, USA

SO Antimicrobial Agents and Chemotherapy (1993), 37(9), 1799-806 CODEN: AMACCQ; ISSN: 0066-4804

DT Journal

LA English

IT 91188-27-1

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); BIOL (Biological study)
(Mycobacterium avium sensitivity to)

RN 91188-27-1 CAPLUS

CN 1,8-Naphthyridine-3-carboxylic acid, 1-ethyl-6-fluoro-1,4-dihydro-7-(7-methyl-2,7-diazaspiro[4.4]non-2-yl)-4-oxo- (9CI) (CA INDEX NAME)

L8 ANSWER 5 OF 8 CAPLUS COPYRIGHT 2004 ACS on STN GI

- AB Fluoroquinolone antibacterials having the 7-position (10-position of pyridobenzoxazines) substituted with 2,7-diazaspiro[4.4]nonane, 1,7-diazaspiro[4.4]nonane, or 2,8-diazaspiro[5.5]undecane (e.g. I (X = CF, CH, N) were prepared and their biol. activities were compared with piperazine and pyrrolidine substituted analogs. Most exhibited potent Gram-pos. and Gram-neg. activity, especially when side chain was N-alkylated. Thus, the quinolinecarboxylic acid II was treated with 2-methyl-2,7-diazaspiro[4.4]nonane to give I (X = CH).
- AN 1990:497432 CAPLUS
- DN 113:97432
- TI Quinolone antibacterial agents substituted at the 7-position with spiroamines. Synthesis and structure-activity relationships
- AU Culbertson, Townley P.; Sanchez, Joseph P.; Gambino, Laura; Sesnie, Josephine A.
- CS Parke-Davis Pharm. Res. Div., Warner-Lambert Co., Ann Arbor, MI, 48105, USA
- SO Journal of Medicinal Chemistry (1990), 33(8), 2270-5 CODEN: JMCMAR; ISSN: 0022-2623
- DT Journal
- LA English
- OS CASREACT 113:97432
- 91188-27-1P 91188-34-0P 91196-83-7P
  RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological

study); PREP (Preparation)

(preparation and bactericidal activity of)

RN 91188-27-1 CAPLUS

CN 1,8-Naphthyridine-3-carboxylic acid, 1-ethyl-6-fluoro-1,4-dihydro-7-(7-methyl-2,7-diazaspiro[4.4]non-2-yl)-4-oxo- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} & \text{Et} & \text{Me} \\ \hline \\ N & N & N \\ \hline \\ N & N \\ \end{array}$$

RN 91188-34-0 CAPLUS

CN 1,8-Naphthyridine-3-carboxylic acid, 1-ethyl-7-(7-ethyl-2,7-diazaspiro[4.4]non-2-yl)-6-fluoro-1,4-dihydro-4-oxo- (9CI) (CA INDEX NAME)

RN 91196-83-7 CAPLUS

CN 1,8-Naphthyridine-3-carboxylic acid, 7-(2,7-diazaspiro[4.4]non-2-yl)-1-ethyl-6-fluoro-1,4-dihydro-4-oxo-, monohydrochloride (9CI) (CA INDEX NAME)

● HCl

L8 ANSWER 6 OF 8 CAPLUS COPYRIGHT 2004 ACS on STN GI

AB The title compds. [I; A = N, CR9; R1 = Me, Et, cyclopropyl, etc.; R2 = H, alkyl, (5-methyl-2-oxo-1,3-dioxol-4-yl)methyl; R3 = Me, 13 N-attached heterocyclyl; R9 = H, halo, Me, cyano, NO2; R1R9 = OCH2CHMe, SCH2CHMe, CH2CH2CHMe] were prepared C6F5COCH2CO2Et (preparation given) was refluxed 2 h with HC(OEt)3 in Ac2O to give C6F5COC(CO2Et):CHOEt which was treated overnight with cyclopropylamine in EtOH to give C6F5COC(CO2Et):CHNHR (R = cyclopropyl). The latter was refluxed 3 h in DMF containing NaF to give, after saponification, quinolonecarboxylate II (R3 = Y = F) which was refluxed

3 h
 with 1-methylpiperazine in MeCN/DMF containing Dabco to give II (R3 =
 4-methyl-1-piperazinyl, Y = F) (III). Tablets were prepared each containing

583.0, cellulose 55.0, starch 72.0, polyvinylpyrrolidone 30.0, SiO2 5.0, and Mg stearate 5.0 mg with a coating comprising (hydroxypropyl)methylcellulose 6.0, Macrogol 40,000 2.0, and TiO2 2.0 mg.

II (R3 = 3-methyl-1-piperazinyl, Y = NH2) had a min. inhibitory concentration of

0.5 (units not given) against Escherichia coli 455/7.

AN 1989:114697 CAPLUS

DN 110:114697

TI Preparation of 5-substituted quinolone- and naphthyridonecarboxylic acids as antibacterial agents

IN Petersen, Uwe; Grohe, Klaus; Schriewer, Michael; Schenke, Thomas; Haller, Ingo; Metzger, Karl; Endermann, Rainer; Zeiler, Hans Joachim

PA Bayer A.-G., Fed. Rep. Ger.

SO Ger. Offen., 32 pp.

CODEN: GWXXBX

DT Patent

LA German

FAN.CNT 1

|    | PATENT NO.     | KIND   | DATE        | APPLICATION NO.    | DATE     |
|----|----------------|--------|-------------|--------------------|----------|
|    |                |        |             |                    |          |
| ΡI | DE 3711193     | A1     | 19881013    | DE 1987-3711193    | 19870402 |
|    | NO 8801121     | Α      | 19881003    | NO 1988-1121       | 19880314 |
|    | EP 284935      | A1     | 19881005    | EP 1988-104452     | 19880321 |
|    | R: AT, BE, CH, | DE, ES | , FR, GB, G | GR, IT, LI, NL, SE |          |
|    | AU 8813811     | A1     | 19881006    | AU 1988-13811      | 19880328 |
|    | DD 274029      | A5     | 19891206    | DD 1988-314159     | 19880329 |
|    | DK 8801802     | A      | 19881003    | DK 1988-1802       | 19880330 |
|    | FI 8801501     | Α      | 19881003    | FI 1988-1501       | 19880330 |
|    | CN 88101741    | A      | 19881116    | CN 1988-101741     | 19880331 |
|    | ZA 8802318     | Α      | 19881228    | ZA 1988-2318       | 19880331 |

 JP 63258855
 A2
 19881026
 JP 1988-78298
 19880401

 HU 47098
 A2
 19890130
 HU 1988-1619
 19880401

 HU 201050
 B
 19900928

PRAI DE 1987-3711193 19870402

OS CASREACT 110:114697; MARPAT 110:114697

IT 119354-28-8P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses) (preparation of, as antibacterial agent)

RN 119354-28-8 CAPLUS

CN 1,8-Naphthyridine-3-carboxylic acid, 5-amino-1-ethyl-6-fluoro-1,4-dihydro-7-(7-methyl-2,7-diazaspiro[4.4]non-2-yl)-4-oxo-(9CI) (CA INDEX NAME)

$$\begin{array}{c|c} & \text{Et} & \text{Me} \\ \hline \\ \text{N} & \text{N} & \text{N} \\ \hline \\ \text{O} & \text{NH}_2 \\ \end{array}$$

L8 ANSWER 7 OF 8 CAPLUS COPYRIGHT 2004 ACS on STN GI

AB The title compds. (I; X = FC, N; R1 = H, alkyl, cation; R2 = amino, heterocyclyl) were prepared Thus, 2,3,4,5-F4C6HCO2H was converted to its acid chloride and condensed with EtO2CCH2CO2H to give 2,3,4,5-F4C6HCOCH2CO2H. This was cyclocondensed with (EtO)3CH and cyclopropylamine to give I (X = FC, R1 = H, R2 = F). The latter was treated with 3-pyrrolidinemethanamine to give 7-[3-(aminomethyl)-1-pyrrolidinyl]-3-quinolinecarboxylic acid derivative II. II had a min. inhibitory concentration of <0.1 μg/mL against, e.g., Escherichia coli Vogel.

AN 1986:34013 CAPLUS DN 104:34013

TI 7-Substituted-1-cyclopropyl-6,8-difluoro-1,4-dihydro-4-oxo-3-quinolinecarboxylic acids; 7-substituted-1-cyclopropyl-1,4-dihydro-6-fluoro-4-oxo-1,8-naphthyridine-3-carboxylic acids and their derivatives IN Culbertson, Townley P.; Mich, Thomas F.; Domagala, John M.; Nichols, Jeffrey B.

PA Warner-Lambert Co. , USA SO Eur. Pat. Appl., 137 pp. CODEN: EPXXDW DΤ Patent LΑ English FAN.CNT 3 PATENT NO. APPLICATION NO. KIND DATE DATE ----\_\_\_\_\_\_ -----\_\_\_\_\_ PΙ EP 1985-301009 EP 153163 A2 19850828 19850215 EP 153163 Α3 19860129 EP 153163 B1 19891227 R: AT, BE, CH, DE, FR, GB, IT, LI, LU, NL, SE US 4665079 19870512 US 1985-692820 19850123 Α ZA 8500854 Α 19860924 ZA 1985-854 19850204 CA 1289956 **A**1 19911001 CA 1985-473502 19850204 IL 74286 **A**1 19880731 IL 1985-74286 19850208 AU 8538618 19850822 AU 1985-38618 A1 19850211 AU 568004 B2 19871210 DK 8500687 Α 19850818 DK 1985-687 19850214 DK 161889 В 19910826 DK 161889 С 19920203 FI 8500631 Α 19850818 FI 1985-631 19850215 FI 83312 В 19910315 FI 83312 C 19910625 NO 8500614 Α 19850819 NO 1985-614 19850215 NO 161370 В 19890502 C NO 161370 19890809 JP 60214773 **A2** 19851028 JP 1985-26669 19850215 JP 07055945 **B4** 19950614 HU 37149 0 19851128 HU 1985-580 19850215 ES 540441 **A**1 19870501 ES 1985-540441 19850215 AT 48997 E 19900115 AT 1985-301009 19850215 JP 07173160 A2 19950711 JP 1994-278595 19941019 PRAI US 1984-581157 19840217 US 1985-692820 19850123 US 1982-416406 19820909 US 1983-522275 19830812 IL 1983-69601 19830830 EP 1985-301009 19850215 OS CASREACT 104:34013 ΙT 91188-24-8P 91188-27-1P 91188-34-0P 99734-94-8P RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses) (preparation of, as bactericide) RN91188-24-8 CAPLUS CN1,8-Naphthyridine-3-carboxylic acid, 7-(2,7-diazaspiro[4.4]non-2-yl)-1-

ethyl-6-fluoro-1,4-dihydro-4-oxo- (9CI) (CA INDEX NAME)

RN 91188-27-1 CAPLUS

CN 1,8-Naphthyridine-3-carboxylic acid, 1-ethyl-6-fluoro-1,4-dihydro-7-(7-methyl-2,7-diazaspiro[4.4]non-2-yl)-4-oxo- (9CI) (CA INDEX NAME)

RN 91188-34-0 CAPLUS

CN 1,8-Naphthyridine-3-carboxylic acid, 1-ethyl-7-(7-ethyl-2,7-diazaspiro[4.4]non-2-yl)-6-fluoro-1,4-dihydro-4-oxo-(9CI) (CA INDEX NAME)

RN 99734-94-8 CAPLUS

CN 1,8-Naphthyridine-3-carboxylic acid, 7-(2,7-diazaspiro[4.4]non-2-yl)-1-ethyl-6-fluoro-1,4-dihydro-4-oxo-, hydrochloride (9CI) (CA INDEX NAME)

•x HCl

L8 ANSWER 8 OF 8 CAPLUS COPYRIGHT 2004 ACS on STN GI

$$\begin{array}{c|c}
R & O & CO_2R^3 \\
R^1 & Z & N & R^2 & I
\end{array}$$

AB Title compds. I and II [R = H, halo; R1 = (un)substituted N heterocycle; R2 = alkyl, haloalkyl, hydroxyalkyl, cycloalkyl, vinyl; R3 = H, alkyl, cation; R4, R5 = H, alkyl; Z = H, (un)substituted CH] were prepared Thus, II (R = R1 = F, R3 = R4 = H, R5 = Me) was treated with diazaspirononane III.2HCl, prepared from Et 3-(ethoxycarbonyl)-5-oxo-3-pyrrolidineacetate, to give II (R = 7-methyl-2,7-diazaspiro[4,4]non-2-yl), which had a min. inhibitory concentration against Staphylococcus aureus UC-76 of 0.006 μg/mL.

AN 1984:472740 CAPLUS

DN 101:72740

TI Antibacterial agents

IN Culbertson, Townley P.; Mich, Thomas F.; Domagala, John M.; Nichols, Jeffrey B.

PA Warner-Lambert Co. , USA

SO Eur. Pat. Appl., 125 pp.

CODEN: EPXXDW

DT Patent

LA English

FAN.CNT 3

| PA         | TENT NO.                   | KIND           | DATE                             | APPLICATION NO. | DATE     |
|------------|----------------------------|----------------|----------------------------------|-----------------|----------|
| EP         | 106489<br>106489<br>106489 | A2<br>A3<br>B1 | 19840425<br>19850424<br>19880727 | EP 1983-305148  | 19830906 |
| DE         | R: AT, BE, CH,             |                |                                  | I, LU, NL, SE   |          |
| ZA         | 8306357                    | Α              | 19840425                         | ZA 1983-6357    | 19830826 |
| $_{ m IL}$ | 69601                      | A1             | 19870831                         | IL 1983-69601   | 19830830 |
| $_{ m IL}$ | 80848                      | A1             | 19880930                         | IL 1983-80848   | 19830830 |
| IL         | 80849                      | A1             | 19881031                         | IL 1983-80849   | 19830830 |
| FI         | 8303151                    | Α              | 19840310                         | FI 1983-3151    | 19830905 |
| FI         | 83513                      | В              | 19910415                         |                 |          |
| FI         | 83513                      | C              | 19910725                         |                 |          |
| AU         | 8318698                    | A1             | 19840315                         | AU 1983-18698   | 19830905 |
| AU-        | 562286                     | B2             | 19870604                         |                 |          |
| AT         | 35987                      | E              | 19880815                         | AT 1983-305148  | 19830906 |
| CS         | 246065                     | B2             | 19861016                         | CS 1983-6498    | 19830907 |

|    | DK 8304074           | A         | 19840310    | DK | 1983-4074    | 19830908 |
|----|----------------------|-----------|-------------|----|--------------|----------|
|    | DK 171098            | B1        | 19960603    |    | 1000 0006    | 1002000  |
|    | NO 8303206           | A         | 19840312    | NO | 1983-3206    | 19830908 |
|    | NO 164418            | В         | 19900625    |    |              |          |
|    | NO 164418            | C         | 19901003    |    |              | 4000000  |
|    | JP 59067269          | A2        | 19840416    | JP | 1983-164271  | 19830908 |
|    | JP 07042284          | B4        | 19950510    |    |              |          |
|    | HU 31718             | 0         | 19840528    | HU | 1983-3140    | 19830908 |
|    | HU 196986            | В         | 19890228    |    |              |          |
|    | DD 216010            | A5        | 19841128    |    | 1983-254624  | 19830908 |
|    | ES 525493            | A1        | 19850116    |    | 1983-525493  | 19830908 |
|    | SU 1360584           | A3        | 19871215    |    | 1983-3659624 | 19831103 |
|    | ES 529934            | A1        | 19850601    |    | 1984-529934  | 19840222 |
|    | ES 529936            | A1        | 19850616    |    | 1984-529936  | 19840222 |
|    | ES 529937            | A1        | 19850616    |    | 1984-529937  | 19840222 |
|    | ES 529935            | A1        | 19850701    |    | 1984-529935  | 19840222 |
|    | ES 529933            | A1        | 19851016    |    | 1984-529933  | 19840222 |
|    | SU 1321376           | A3        | 19870630    |    | 1984-3732809 | 19840427 |
|    | SU 1314954           | <b>A3</b> | 19870530    |    | 1984-3736502 | 19840503 |
|    | CS 246083            | B2        | 19861016    |    | 1984-4630    | 19840618 |
|    | CS 246084            | B2        | 19861016    |    | 1984-4631    | 19840618 |
|    | CS 247180            | B2        | 19861218    |    | 1984-4632    | 19840618 |
|    | JP 01146880          | A2        | 19890608    |    | 1988-282640  | 19881110 |
|    | JP 04210961          | A2        | 19920803    | JР | 1991-53587   | 19910227 |
|    | JP 06062561          | B4        | 19940817    |    |              |          |
|    | JP 07070111          | A2        | 19950314    | JP | 1994-32109   | 19940302 |
|    | JP 07080770          | B4        | 19950830    |    |              |          |
|    | DK 9400700           | Α         | 19940616    |    | 1994-70094   | 19940616 |
|    | DK 170471            | B1        | 19950911    |    | 1994-700     | 19940616 |
|    | JP 08311061          | A2        | 19961126    | JP | 1996-134697  | 19960529 |
|    | JP 2704984           | B2        | 19980126    |    |              |          |
|    | US 1982-416406       |           | 19820909    |    |              |          |
|    | US 1983-522275       |           | 19830812    |    |              |          |
|    | IL 1983-69601        |           | 19830830    |    |              | •        |
|    | EP 1983-305148       |           | 19830906    |    |              |          |
|    | CS 1983-6498         |           | 19830907    |    |              |          |
|    | JP 1983-164271       |           | 19830908    |    |              |          |
| IT | 91188-24-8P 91188-27 | -1P 9     | 91188-34-0P |    |              |          |

IT 91188-24-8P 91188-27-1P 91188-34-0P 91196-83-7P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation)

(preparation and bactericidal activity of)

RN 91188-24-8 CAPLUS

CN 1,8-Naphthyridine-3-carboxylic acid, 7-(2,7-diazaspiro[4.4]non-2-yl)-1-ethyl-6-fluoro-1,4-dihydro-4-oxo- (9CI) (CA INDEX NAME)

RN 91188-27-1 CAPLUS

CN 1,8-Naphthyridine-3-carboxylic acid, 1-ethyl-6-fluoro-1,4-dihydro-7-(7-methyl-2,7-diazaspiro[4.4]non-2-yl)-4-oxo- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} & \text{Et} & \text{Me} \\ \hline \\ \text{N} & \text{N} & \\ \\ \text{N} & \\ \\ \text{O} & \\ \end{array}$$

RN 91188-34-0 CAPLUS

CN 1,8-Naphthyridine-3-carboxylic acid, 1-ethyl-7-(7-ethyl-2,7-diazaspiro[4.4]non-2-yl)-6-fluoro-1,4-dihydro-4-oxo-(9CI) (CA INDEX NAME)

RN 91196-83-7 CAPLUS

CN 1,8-Naphthyridine-3-carboxylic acid, 7-(2,7-diazaspiro[4.4]non-2-yl)-1-ethyl-6-fluoro-1,4-dihydro-4-oxo-, monohydrochloride (9CI) (CA INDEX NAME)

● HCl

=> file registry
COST IN U.S. DOLLARS

SINCE FILE TOTAL ENTRY SESSION

FULL ESTIMATED COST

77.48 394.17

DISCOUNT AMOUNTS (FOR QUALIFYING ACCOUNTS)

SINCE FILE

TOTAL

ENTRY

SESSION

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STRUCTURE FILE UPDATES: 21 SEP 2004 HIGHEST RN 749178-43-6 DICTIONARY FILE UPDATES: 21 SEP 2004 HIGHEST RN 749178-43-6

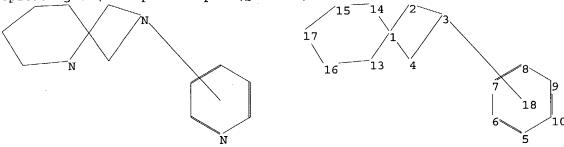
TSCA INFORMATION NOW CURRENT THROUGH MAY 21, 2004

Please note that search-term pricing does apply when conducting SmartSELECT searches.

Crossover limits have been increased. See HELP CROSSOVER for details.

Experimental and calculated property data are now available. For more information enter HELP PROP at an arrow prompt in the file or refer to the file summary sheet on the web at: http://www.cas.org/ONLINE/DBSS/registryss.html

Uploading C:\Stnexp4 corrupted\QUERIES\10607930.str



ring nodes :

1 2 3 4 5 6 7 8 9 10 13 14 15 16 17

ring bonds :

1-4 1-2 1-13 1-14 2-3 3-4 5-6 5-10 6-7 7-8 8-9 9-10 13-16 14-15 15-17 16-17

exact/norm bonds :

1-4 1-2 1-13 1-14 2-3 3-4 13-16 14-15 15-17 16-17

normalized bonds :

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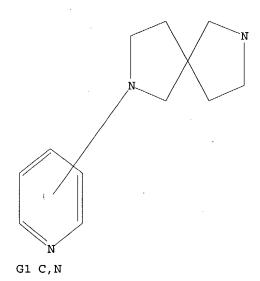
G1:C,N

Match level :

1:Atom 2:Atom 3:Atom 4:Atom 5:Atom 6:Atom 7:Atom 8:Atom 9:Atom 10:Atom 13:Atom 14:Atom 15:Atom 16:Atom 17:Atom 18:CLASS

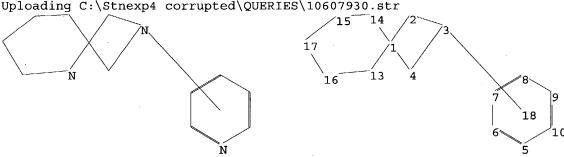
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=> d 19 L9 HAS NO ANSWERS L9 STR



Structure attributes must be viewed using STN Express query preparation.

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Uploading C:\Stnexp4 corrupted\QUERIES\10607930.str



ring nodes :
1 2 3 4 5 6 7 8 9 10 13 14 15 16 17
ring bonds :
1-4 1-2 1-13 1-14 2-3 3-4 5-6 5-10 6-7 7-8 8-9 9-10 13-16 14-15 15-17
16-17
exact/norm bonds :
1-4 1-2 1-13 1-14 2-3 3-4 13-16 14-15 15-17 16-17
normalized bonds :
5-6 5-10 6-7 7-8 8-9 9-10

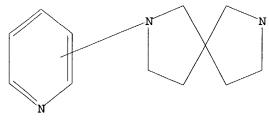
G1:C,N

Match level :

1:Atom 2:Atom 3:Atom 4:Atom 5:Atom 6:Atom 7:Atom 8:Atom 9:Atom 10:Atom 13:Atom 14:Atom 15:Atom 16:Atom 17:Atom 18:CLASS

L10 STRUCTURE UPLOADED

=> d 110L10 HAS NO ANSWERS L10 STR



G1 C,N

Structure attributes must be viewed using STN Express query preparation.

=> s 110

SAMPLE SEARCH INITIATED 15:20:38 FILE 'REGISTRY' SAMPLE SCREEN SEARCH COMPLETED -44 TO ITERATE

100.0% PROCESSED

44 ITERATIONS

0 ANSWERS

SEARCH TIME: 00.00.01

FULL FILE PROJECTIONS: ONLINE \*\*COMPLETE\*\*

BATCH

\*\*COMPLETE\*\* 1277

PROJECTED ITERATIONS: PROJECTED ANSWERS:

483 TO

0 TO

L11

0 SEA SSS SAM L10

=> s l10 ful

FULL SEARCH INITIATED 15:20:44 FILE 'REGISTRY' FULL SCREEN SEARCH COMPLETED - 881 TO ITERATE

100.0% PROCESSED

881 ITERATIONS

9 ANSWERS

SEARCH TIME: 00.00.01

L12

9 SEA SSS FUL L10

=> file caplus

COST IN U.S. DOLLARS

SINCE FILE TOTAL ENTRY SESSION

10607930

FULL ESTIMATED COST

158.36 552.53

DISCOUNT AMOUNTS (FOR QUALIFYING ACCOUNTS)

SINCE FILE TOTAL ENTRY SESSION

CA SUBSCRIBER PRICE

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FILE COVERS 1907 - 22 Sep 2004 VOL 141 ISS 13 FILE LAST UPDATED: 21 Sep 2004 (20040921/ED)

This file contains CAS Registry Numbers for easy and accurate substance identification.

=> s 112

L13

7 L12

=> s 113 not 18

L14

0 L13 NOT L8

=> d abs bib hitstr l13 1-7

L13 ANSWER 1 OF 7 CAPLUS COPYRIGHT 2004 ACS on STN GI

Title compds. [I; R1, R2 = H, (substituted) alkyl, alkenyl, alkynyl, cycloalkylalkyl, aralkyl, etc.; R1R2N = 4-11 membered (bridged) (substituted) heterocyclyl; R3, R4 = H, halo, (substituted) alkyl, alkenyl, alkynyl, perfluoroalkyl, cycloalkyl, cycloalkylalkyl, aryl, aralkyl, heteroaralkyl, OR7, N(R7)2, cyano, etc.; R3R4 = atoms to form 5-7 membered (substituted) ring; R5 = H, halo, alkyl, perfluoroalkyl, OR7, N(R7)2; R6 = (CH2)nR7, (CH2)nCN, (CH2)nCO2R7, (CH2)nOR7, (CH2)nN(R7)2,

ANDN

TI

IN

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RN

```
etc.; R7 = H, alkyl, aryl, heteroaryl, cycloalkyl, aralkyl, aralkenyl,
     cycloalkylalkenyl, etc.; n = 0-5], were prepared for the treatment or
    prevention of obesity, eating disorders, osteoarthritis, cancer, AIDS
     wasting, cachexia, frailty, mental disorders, stress, cognitive disorders,
     sexual function, reproductive function, kidney function, locomotor
    disorders, attention deficit disorder (ADD), substance abuse disorders and
    dyskinesias, Huntington's disease, epilepsy, memory function, and spinal
    muscular atrophy. Thus, 2-piperidin-1-ylquinolin-6-amine and
     (2E)-3-(4-chlorophenyl)prop-2-enoyl chloride were stirred 3 h in HOAc to
    give (2E)-3-(4-chlorophenyl)-N-(2-piperidin-1-ylquinolin-6-yl)prop-2-
    enamide hydrochloride. I bound to MCH-1R receptors with IC50 = 0.1-10000
    2003:434303 CAPLUS
     139:36445
    Preparation of 2-aminoquinolines as melanin concentrating hormone receptor
     (MCH-1R) antagonists.
    Devita, Robert J.; Chang, Lehua; Chaung, Danny; Hoang, Myle; Jiang,
    Jinlong; Lin, Peter; Sailer, Andreas W.; Young, Jonathan R.
    Merck & Co., Inc., USA
    PCT Int. Appl., 178 pp.
    CODEN: PIXXD2
     Patent
    English
FAN.CNT 1
    PATENT NO.
                        KIND
                               DATE
                                           APPLICATION NO.
                                                                   DATE
                         ----
                               _____
                                           ______
                                                                   _____
    WO 2003045313
                         A2
                                20030605
                                            WO 2002-US37556
                                                                   20021122
    WO 2003045313
                         A3
                                20030904
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             CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH,
            GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KR, KZ, LC, LK, LR, LS,
            LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL,
             PT, RO, RU, SC, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ,
            UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD,
            RU, TJ, TM
        RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG,
            CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL,
            PT, SE, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR,
            NE, SN, TD, TG
                                           EP 2002-789837
    EP 1450801
                         A2
                                20040901
                                                                   20021122
            AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT,
             IE, SI, LT, LV, FI, RO, MK, CY, AL, TR, BG, CZ, EE, SK
PRAI US 2001-333581P
                         Ρ
                                20011127
    WO 2002-US37556
                         W
                                20021122
    MARPAT 139:36445
    539852-73-8P, N-[2-(7-Methyl-2,7-diazaspiro[4.4]non-2-yl)quinolin-
    6-yl]-3-[4-(trifluoromethyl)phenyl]propanamide 539852-75-0P,
    N-[2-(7-Benzyl-2,7-diazaspiro[4.4]non-2-yl)quinolin-6-yl]-3-[4-
     (trifluoromethyl)phenyl]propanamide 539852-77-2P,
    N-[2-(2,7-Diazaspiro[4.4]non-2-yl)quinolin-6-yl]-3-[4-
     (trifluoromethyl)phenyl]propanamide
    RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU
     (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES
     (Uses)
        (claimed compound; preparation of 2-aminoquinolines as melanin
concentrating hormone
       receptor (MCH-1R) antagonists)
    539852-73-8 CAPLUS
    Benzenepropanamide, N-[2-(7-methyl-2,7-diazaspiro[4.4]non-2-yl)-6-
```

quinolinyl]-4-(trifluoromethyl)- (9CI) (CA INDEX NAME)

$$\begin{array}{c} O \\ \parallel \\ NH-C-CH_2-CH_2 \end{array}$$

RN 539852-75-0 CAPLUS

CN Benzenepropanamide, N-[2-[7-(phenylmethyl)-2,7-diazaspiro[4.4]non-2-yl]-6-quinolinyl]-4-(trifluoromethyl)- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} & & & \\ &$$

RN 539852-77-2 CAPLUS

CN Benzenepropanamide, N-[2-(2,7-diazaspiro[4.4]non-2-yl)-6-quinolinyl]-4-(trifluoromethyl)- (9Cl) (CA INDEX NAME)

$$\begin{array}{c} \text{O} \\ \text{NH-C-CH}_2\text{-CH}_2 \end{array}$$

L13 ANSWER 2 OF 7 CAPLUS COPYRIGHT 2004 ACS on STN

AB The errors were not reflected in the abstract or the index entries.

AN 1995:2483 CAPLUS

DN 123:164953

TI Anti-mycobacterium avium activity of quinolones: in vitro activities. [Erratum to document cited in CA120:27300f]

AU Klopman, Gilles; Wang, Shaomeng; Jacobs, Michael R.; Bajaksouzian, Saralee; Edmonds, Kay; Ellner, Jerrold J.

CS Chem. Dep., Case West. Reserve Univ., Cleveland, OH, 44106, USA

SO Antimicrobial Agents and Chemotherapy (1993), 37(12), 2766 CODEN: AMACCQ; ISSN: 0066-4804

DT Journal

LA English

IT 91188-27-1

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(Mycobacterium avium sensitivity to (Erratum))

RN 91188-27-1 CAPLUS

CN 1,8-Naphthyridine-3-carboxylic acid, 1-ethyl-6-fluoro-1,4-dihydro-7-(7-methyl-2,7-diazaspiro[4.4]non-2-yl)-4-oxo- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} & \text{Et} & \text{Me} \\ \hline \\ \text{N} & \text{N} & \text{N} \\ \hline \\ \text{HO}_2\text{C} & \text{F} \end{array}$$

L13 ANSWER 3 OF 7 CAPLUS COPYRIGHT 2004 ACS on STN

The MICs of 88 quinolones against 14 selected reference and clin. strains of AB Mycobacterium avium-M. intracellulare complex were determined Agents tested included ciprofloxacin, sparfloxacin (PD 131501), and 86 other exptl. quinolones. Test strains were selected to represent various susceptibilities to ciprofloxacin and other drug resistance profiles. MICs were determined by the microdilution method in 7HSF broth, with incubation for 14 days at 35°. The results showed 25 of the quinolones to be active against the strains, with MICs for 90% of the strains (MIC90s) of 2 to 32 µg/mL. Ten of these compds. had activities equivalent to or greater than that of ciprofloxacin. The most active compound was PD 125354, with an MIC50 of 0.5  $\mu g/mL$  and an MIC90 of 2  $\mu g/mL$ ; comparable values for ciprofloxacin were 4 and 8 μq/mL, resp. The next most active compds., with MIC90s of 4 µg/mL, were sparfloxacin (PD 131501), PD 123982, PD 135144, and PD 119421. MIC90s of PD 131575, PD 126889, PD 122642, PD 139586, and PD 143289 were 8  $\mu$ g/mL. Further evaluation of the most active agents is warranted, as is assessment of structure-activity relationships of active and inactive agents to elucidate the active portions of the compds. and to lead to the development of compds. with enhanced activity.

AN 1994:27300 CAPLUS

DN 120:27300

TI Anti-mycobacterium avium activity of quinolones: in vitro activities

AU Klopman, Gilles; Wang, Shaomeng; Jacobs, Michael R.; Bajaksouzian, Saralee; Edmonds, Kay; Ellner, Jerrold J.

CS Chem. Dep., Case West. Reserve Univ., Cleveland, OH, 44106, USA

SO Antimicrobial Agents and Chemotherapy (1993), 37(9), 1799-806 CODEN: AMACCQ; ISSN: 0066-4804

DT Journal

LA English

IT 91188-27-1

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); BIOL (Biological study)
(Mycobacterium avium sensitivity to)

RN 91188-27-1 CAPLUS

CN 1,8-Naphthyridine-3-carboxylic acid, 1-ethyl-6-fluoro-1,4-dihydro-7-(7-methyl-2,7-diazaspiro[4.4]non-2-yl)-4-oxo- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} & \text{Et} & \text{Me} \\ \hline \\ N & N & N \\ \hline \\ N & N \\ \\ N$$

# L13 ANSWER 4 OF 7 CAPLUS COPYRIGHT 2004 ACS on STN GI

- Fluoroquinolone antibacterials having the 7-position (10-position of pyridobenzoxazines) substituted with 2,7-diazaspiro[4.4]nonane, 1,7-diazaspiro[4.4]nonane, or 2,8-diazaspiro[5.5]undecane (e.g. I (X = CF, CH, N) were prepared and their biol. activities were compared with piperazine and pyrrolidine substituted analogs. Most exhibited potent Gram-pos. and Gram-neg. activity, especially when side chain was N-alkylated. Thus, the quinolinecarboxylic acid II was treated with 2-methyl-2,7-diazaspiro[4.4]nonane to give I (X = CH).
- AN 1990:497432 CAPLUS
- DN 113:97432
- TI Quinolone antibacterial agents substituted at the 7-position with spiroamines. Synthesis and structure-activity relationships
- AU Culbertson, Townley P.; Sanchez, Joseph P.; Gambino, Laura; Sesnie, Josephine A.
- CS Parke-Davis Pharm. Res. Div., Warner-Lambert Co., Ann Arbor, MI, 48105, USA
- SO Journal of Medicinal Chemistry (1990), 33(8), 2270-5 CODEN: JMCMAR; ISSN: 0022-2623
- DT Journal
- LA English
- OS CASREACT 113:97432
- 91188-27-1P 91188-34-0P 91196-83-7P
  RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation)
- (preparation and bactericidal activity of)
- RN 91188-27-1 CAPLUS
- CN 1,8-Naphthyridine-3-carboxylic acid, 1-ethyl-6-fluoro-1,4-dihydro-7-(7-methyl-2,7-diazaspiro[4.4]non-2-yl)-4-oxo- (9CI) (CA INDEX NAME)

RN 91188-34-0 CAPLUS

CN 1,8-Naphthyridine-3-carboxylic acid, 1-ethyl-7-(7-ethyl-2,7-diazaspiro[4.4]non-2-yl)-6-fluoro-1,4-dihydro-4-oxo-(9CI) (CA INDEX NAME)

RN 91196-83-7 CAPLUS

CN 1,8-Naphthyridine-3-carboxylic acid, 7-(2,7-diazaspiro[4.4]non-2-yl)-1-ethyl-6-fluoro-1,4-dihydro-4-oxo-, monohydrochloride (9CI) (CA INDEX NAME)

HCl

L13 ANSWER 5 OF 7 CAPLUS COPYRIGHT 2004 ACS on STN GI

AB The title compds. [I; A = N, CR9; R1 = Me, Et, cyclopropyl, etc.; R2 = H, alkyl, (5-methyl-2-oxo-1,3-dioxol-4-yl)methyl; R3 = Me, 13 N-attached heterocyclyl; R9 = H, halo, Me, cyano, NO2; R1R9 = OCH2CHMe, SCH2CHMe, CH2CH2CHMe] were prepared C6F5COCH2CO2Et (preparation given) was refluxed 2 h with HC(OEt)3 in Ac2O to give C6F5COC(CO2Et):CHOEt which was treated overnight with cyclopropylamine in EtOH to give C6F5COC(CO2Et):CHNHR (R = cyclopropyl). The latter was refluxed 3 h in DMF containing NaF to give, after saponification, quinolonecarboxylate II (R3 = Y = F) which was refluxed

3 h
 with 1-methylpiperazine in MeCN/DMF containing Dabco to give II (R3 =
 4-methyl-1-piperazinyl, Y = F) (III). Tablets were prepared each containing
III

583.0, cellulose 55.0, starch 72.0, polyvinylpyrrolidone 30.0, SiO2 5.0, and Mg stearate 5.0 mg with a coating comprising (hydroxypropyl)methylcellulose 6.0, Macrogol 40,000 2.0, and TiO2 2.0 mg. II (R3 = 3-methyl-1-piperazinyl, Y = NH2) had a min. inhibitory concentration

0.5 (units not given) against Escherichia coli 455/7.

AN 1989:114697 CAPLUS

DN 110:114697

of

TI Preparation of 5-substituted quinolone- and naphthyridonecarboxylic acids as antibacterial agents

IN Petersen, Uwe; Grohe, Klaus; Schriewer, Michael; Schenke, Thomas; Haller,
Ingo; Metzger, Karl; Endermann, Rainer; Zeiler, Hans Joachim

PA Bayer A.-G., Fed. Rep. Ger.

SO Ger. Offen., 32 pp.

CODEN: GWXXBX

DT Patent

LA German

FAN.CNT 1

| 1,1,01,1 |         |      |       |      |     |            |    |       |      |       |         |           |          |        |     |
|----------|---------|------|-------|------|-----|------------|----|-------|------|-------|---------|-----------|----------|--------|-----|
|          | PAT     | TENT | NO.   |      |     | KINI       | )  | DATE  |      | AP    | PLICAT: | ION NO    |          | DATE   |     |
|          |         |      |       |      |     |            | -  |       |      |       |         | <b></b> . |          |        |     |
| ΡI       | DE      | 3711 | 193   |      |     | A1         |    | 1988  | 1013 | DE    | 1987-3  | 3711193   | 3        | 19870  | 402 |
|          | ИО      | 8801 | 121   |      |     | Α          |    | 1988  | 1003 | ИО    | 1988-1  | 1121      |          | 19880  | 314 |
|          | ΕP      | 2849 | 35    |      |     | <b>A</b> 1 |    | 1988  | 1005 | EP    | 1988-   | 104452    |          | 198803 | 321 |
|          |         | R:   | ΑT,   | BE,  | CH, | DE,        | ES | , FR, | GB,  | GR, I | T, LI,  | NL, SH    | <b>Ξ</b> |        |     |
|          | ΑU      | 8813 | 811   |      |     | A1         |    | 1988  | 1006 | AU    | 1988-1  | 13811     |          | 19880  | 328 |
|          | DD      | 2740 | 29    |      |     | <b>A</b> 5 |    | 1989  | 1206 | DD    | 1988-3  | 314159    |          | 19880  | 329 |
|          | DK      | 8801 | 802   |      |     | Α          |    | 1988  | 1003 | DK    | 1988-1  | 1802      |          | 198803 | 330 |
|          | FI      | 8801 | 501   |      |     | Α          |    | 1988  | 1003 | FI    | 1988-1  | 1501      |          | 198803 | 330 |
|          | CN      | 8810 | 1741  |      |     | Α          |    | 1988  | 1116 | CN    | 1988-1  | 101741    |          | 198803 | 331 |
|          | $z_{A}$ | 8802 | 318   |      |     | Α          |    | 1988  | 1228 | ZA    | 1988-2  | 2318      |          | 198803 | 331 |
|          | JΡ      | 6325 | 8855  |      |     | A2         |    | 1988  | 1026 | JP    | 1988-7  | 78298     |          | 198804 | 401 |
|          | HU      | 4709 | 8     |      |     | A2         |    | 1989  | 0130 | HU    | 1988-1  | 1619      |          | 198804 | 401 |
|          | HU      | 2010 | 50    |      |     | В          |    | 1990  | 0928 |       |         |           |          |        |     |
| PRAI     | DE      | 1987 | -3713 | 1193 |     |            |    | 1987  | 0402 |       |         |           |          |        |     |

OS CASREACT 110:114697; MARPAT 110:114697

IT 119354-28-8P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses) (preparation of, as antibacterial agent)

RN 119354-28-8 CAPLUS

CN 1,8-Naphthyridine-3-carboxylic acid, 5-amino-1-ethyl-6-fluoro-1,4-dihydro-7-(7-methyl-2,7-diazaspiro[4.4]non-2-yl)-4-oxo-(9CI) (CA INDEX NAME)

# L13 ANSWER 6 OF 7 CAPLUS COPYRIGHT 2004 ACS on STN GI

- The title compds. (I; X = FC, N; R1 = H, alkyl, cation; R2 = amino, heterocyclyl) were prepared Thus, 2,3,4,5-F4C6HCO2H was converted to its acid chloride and condensed with EtO2CCH2CO2H to give 2,3,4,5-F4C6HCOCH2CO2H. This was cyclocondensed with (EtO)3CH and cyclopropylamine to give I (X = FC, R1 = H, R2 = F). The latter was treated with 3-pyrrolidinemethanamine to give 7-[3-(aminomethyl)-1-pyrrolidinyl]-3-quinolinecarboxylic acid derivative II. II had a min. inhibitory concentration of <0.1  $\mu$ g/mL against, e.g., Escherichia coli Vogel.
- AN 1986:34013 CAPLUS
- DN 104:34013
- TI 7-Substituted-1-cyclopropyl-6,8-difluoro-1,4-dihydro-4-oxo-3-quinolinecarboxylic acids; 7-substituted-1-cyclopropyl-1,4-dihydro-6-fluoro-4-oxo-1,8-naphthyridine-3-carboxylic acids and their derivatives
- IN Culbertson, Townley P.; Mich, Thomas F.; Domagala, John M.; Nichols, Jeffrey B.
- PA Warner-Lambert Co. , USA
- SO Eur. Pat. Appl., 137 pp. CODEN: EPXXDW
- DT Patent

| LA English<br>FAN.CNT 3   |   |  |   |  |  |  |  |
|---|---|--|---|--|--|--|--|
| PATENT NÓ.  | KIND  | DATE   | APPLICATION NO.   | DATE   |  |  |  |
| PI EP 153163<br>EP 153163<br>EP 153163  | A2<br>A3<br>B1                                | 19850828<br>19860129<br>19891227   | EP 1985-301009  | 19850215   |  |  |  |
| US 4665079 ZA 8500854 CA 1289956 IL 74286 AU 8538618 AU 568004 DK 8500687 DK 161889 DK 161889 FI 8500631 FI 83312   | A<br>A1<br>A1<br>A1<br>B2<br>A<br>B<br>C<br>A | 19870512<br>19860924<br>19911001<br>19880731<br>19850822<br>19871210<br>19850818<br>19910826<br>19920203<br>19850818<br>19910315 | US 1985-692820 ZA 1985-854 CA 1985-473502 IL 1985-74286 AU 1985-38618 DK 1985-687 FI 1985-631 | 19850123<br>19850204<br>19850204<br>19850208<br>19850211<br>19850214 |  |  |  |
| FI 83312<br>NO 8500614<br>NO 161370<br>NO 161370  | C<br>A<br>B<br>C                              | 19910625<br>19850819<br>19890502<br>19890809   | NO 1985-614   | 19850215   |  |  |  |
| JP 60214773<br>JP 07055945<br>HU 37149  | A2<br>B4<br>O                                 | 19851028<br>19950614<br>19851128   | JP 1985-26669<br>HU 1985-580  | 19850215<br>19850215   |  |  |  |
| ES 540441<br>AT 48997<br>JP 07173160  | A1<br>E<br>A2                                 | 19870501<br>19900115<br>19950711   | ES 1985-540441<br>AT 1985-301009<br>JP 1994-278595  | 19850215<br>19850215<br>19941019                                     |  |  |  |
| PRAI US 1984-581157<br>US 1985-692820<br>US 1982-416406<br>US 1983-522275<br>IL 1983-69601<br>EP 1985-301009  |   | 19840217<br>19850123<br>19820909<br>19830812<br>19830830<br>19850215   |   |  |  |  |  |
| OS CASREACT 104:34013 IT 91188-24-8P 91188-27-1P 91188-34-0P 99734-94-8P RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses) (preparation of, as bactericide) |   |  |   |  |  |  |  |
|   | e-3-carbox                                    |  | 7-(2,7-diazaspiro[4.4]<br>I) (CA INDEX NAME)  | non-2-yl)-1-   |  |  |  |

HO<sub>2</sub>C F

RN 91188-27-1 CAPLUS

CN 1,8-Naphthyridine-3-carboxylic acid, 1-ethyl-6-fluoro-1,4-dihydro-7-(7-methyl-2,7-diazaspiro[4.4]non-2-yl)-4-oxo- (9CI) (CA INDEX NAME)

RN 91188-34-0 CAPLUS

CN 1,8-Naphthyridine-3-carboxylic acid, 1-ethyl-7-(7-ethyl-2,7-diazaspiro[4.4]non-2-yl)-6-fluoro-1,4-dihydro-4-oxo-(9CI) (CA INDEX NAME)

RN 99734-94-8 CAPLUS

CN 1,8-Naphthyridine-3-carboxylic acid, 7-(2,7-diazaspiro[4.4]non-2-yl)-1-ethyl-6-fluoro-1,4-dihydro-4-oxo-, hydrochloride (9CI) (CA INDEX NAME)

•x HCl

L13 ANSWER 7 OF 7 CAPLUS COPYRIGHT 2004 ACS on STN GI

$$\begin{array}{c|c}
R & O & CO_2R^3 \\
R^1 & Z & N & R^2 & I
\end{array}$$

AB Title compds. I and II [R = H, halo; R1 = (un)substituted N heterocycle; R2 = alkyl, haloalkyl, hydroxyalkyl, cycloalkyl, vinyl; R3 = H, alkyl, cation; R4, R5 = H, alkyl; Z = H, (un)substituted CH] were prepared Thus, II (R = R1 = F, R3 = R4 = H, R5 = Me) was treated with diazaspirononane III.2HCl, prepared from Et 3-(ethoxycarbonyl)-5-oxo-3-pyrrolidineacetate, to give II (R = 7-methyl-2,7-diazaspiro[4,4]non-2-yl), which had a min. inhibitory concentration against Staphylococcus aureus UC-76 of 0.006 μg/mL.

AN 1984:472740 CAPLUS

DN 101:72740

TI Antibacterial agents

IN Culbertson, Townley P.; Mich, Thomas F.; Domagala, John M.; Nichols, Jeffrey B.

PA Warner-Lambert Co. , USA

SO Eur. Pat. Appl., 125 pp. CODEN: EPXXDW

DT Patent

LA English

FAN.CNT 3

|    | PATENT NO.     | KIND I      | DATE        | APPLICATION NO. | DATE     |
|----|----------------|-------------|-------------|-----------------|----------|
| ΡI | EP 106489      | A2 :        | 19840425    | EP 1983-305148  | 19830906 |
|    | EP 106489      | A3 :        | 19850424    |                 |          |
|    | EP 106489      | B1 :        | 19880727    |                 |          |
|    | R: AT, BE, CH, | DE, FR,     | GB, IT, LI, | , LU, NL, SE    |          |
|    | ZA 8306357     | A :         | 19840425    | ZA 1983-6357    | 19830826 |
|    | IL 69601       | A1 :        | 19870831    | IL 1983-69601   | 19830830 |
|    | IL 80848       | <b>A1</b> : | 19880930    | IL 1983-80848   | 19830830 |
|    | 'IL 80849      | A1 :        | 19881031    | IL 1983-80849   | 19830830 |
|    | FI 8303151     | A :         | 19840310    | FI 1983-3151    | 19830905 |
|    | FI 83513       | В :         | 19910415    |                 |          |
|    | FI 83513       | C :         | 19910725    |                 |          |
|    | AU 8318698     | A1 :        | 19840315    | AU 1983-18698   | 19830905 |
|    | AU 562286      | B2 :        | 19870604    |                 |          |
|    | AT 35987       | E :         | 19880815    | AT 1983-305148  | 19830906 |
|    | CS 246065      | B2 :        | 19861016    | CS 1983-6498    | 19830907 |
|    | DK 8304074     | A :         | 19840310    | DK 1983-4074    | 19830908 |
|    | DK 171098      | B1 :        | 19960603    | ·               |          |

|    | NO 8303206         | Α          | 19840312     | NO 1983-3206         | 19830908        |
|----|--------------------|------------|--------------|----------------------|-----------------|
|    | NO 164418          | В          | 19900625     |                      |                 |
|    | NO 164418          | C          | 19901003     |                      |                 |
|    | JP 59067269        | A2         | 19840416     | JP 1983-164271       | 19830908        |
|    | JP 07042284        | B4         | 19950510     |                      |                 |
|    | HU 31718           | 0          | 19840528     | HU 1983-3140         | 19830908        |
|    | HU 196986          | В          | 19890228     |                      |                 |
|    | DD 216010          | A5         | 19841128     | DD 1983-254624       | 19830908        |
|    | ES 525493          | A1         | 19850116     | ES 1983-525493       | 19830908        |
|    | SU 1360584         | A3         | 19871215     | SU 1983-3659624      | 19831103        |
|    | ES 529934          | A1         | 19850601     | ES 1984-529934       | 19840222        |
|    | ES 529936          | A1         | 19850616     | ES 1984-529936       | 19840222        |
|    | ES 529937          | A1         | 19850616     | ES 1984-529937       | 19840222        |
|    | ES 529935          | A1         | 19850701     | ES 1984-529935       | 19840222        |
|    | ES 529933          | A1         | 19851016     | ES 1984-529933       | 19840222        |
|    | SU 1321376         | A3         | 19870630     | SU 1984-3732809      | 19840427        |
|    | SU 1314954         | A3         | 19870530     | SU 1984-3736502      | 19840503        |
|    | CS 246083          | B2         | 19861016     | CS 1984-4630         | 19840618        |
|    | CS 246084          | B2         | 19861016     | CS 1984-4631         | 19840618        |
|    | CS 247180          | B2         | 19861218     | CS 1984-4632         | 19840618        |
|    | JP 01146880 /      | A2         | 19890608     | JP 1988-282640       | 19881110        |
|    | JP 04210961        | A2         | 19920803     | JP 1991-53587        | 19910227        |
|    | JP 06062561        | B4         | 19940817     |                      |                 |
|    | JP 07070111        | A2         | 19950314     | JP 1994-32109        | 19940302        |
|    | JP 07080770        | B4         | 19950830     |                      |                 |
|    | DK 9400700         | Α          | 19940616     | DK 1994-70094        | 19940616        |
|    | DK 170471          | <b>B</b> 1 | 19950911     | DK 1994-700          | 19940616        |
|    | JP 08311061        | A2         | 19961126     | JP 1996-134697       | 19960529        |
|    | JP 2704984         | B2         | 19980126     |                      |                 |
| PR | AI US 1982-416406  |            | 19820909     |                      |                 |
|    | US 1983-522275     |            | 19830812     |                      |                 |
|    | IL 1983-69601      |            | 19830830     |                      |                 |
|    | EP 1983-305148     |            | 19830906     |                      |                 |
|    | CS 1983-6498       |            | 19830907     |                      |                 |
|    | JP 1983-164271     |            | 19830908     |                      |                 |
| IT |                    | -27-1P 9   | 1188-34-0P   | - A.                 |                 |
|    | 91196-83-7P        |            |              |                      |                 |
|    | RL: BAC (Biologica | al activ   | ity or effec | tor, except adverse) | ; BSU (Biologic |
|    | study, unclassifie | ed); SPN   | (Synthetic   | preparation); BIOL   | (Biological     |
|    |                    |            |              |                      |                 |

cal study); PREP (Preparation)

(preparation and bactericidal activity of)

RN91188-24-8 CAPLUS

CN1,8-Naphthyridine-3-carboxylic acid, 7-(2,7-diazaspiro[4.4]non-2-yl)-1ethyl-6-fluoro-1,4-dihydro-4-oxo- (9CI) (CA INDEX NAME)

RN 91188-27-1 CAPLUS

CN1,8-Naphthyridine-3-carboxylic acid, 1-ethyl-6-fluoro-1,4-dihydro-7-(7methyl-2,7-diazaspiro[4.4]non-2-yl)-4-oxo- (9CI) (CA INDEX NAME)

$$\begin{array}{c|c} & \text{Et} & \text{Me} \\ \hline & N & N & \\ & N &$$

RN 91188-34-0 CAPLUS

CN 1,8-Naphthyridine-3-carboxylic acid, 1-ethyl-7-(7-ethyl-2,7-diazaspiro[4.4]non-2-yl)-6-fluoro-1,4-dihydro-4-oxo- (9CI) (CA INDEX NAME)

RN 91196-83-7 CAPLUS

CN 1,8-Naphthyridine-3-carboxylic acid, 7-(2,7-diazaspiro[4.4]non-2-yl)-1-ethyl-6-fluoro-1,4-dihydro-4-oxo-, monohydrochloride (9CI) (CA INDEX NAME)

HCl

=> file registry
COST IN U.S. DOLLARS

FULL ESTIMATED COST

SINCE FILE TOTAL ENTRY SESSION 35.08 587.61

DISCOUNT AMOUNTS (FOR QUALIFYING ACCOUNTS)

SINCE FILE TOTAL

ENTRY -4.90

SESSION -16.80

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TSCA INFORMATION NOW CURRENT THROUGH MAY 21, 2004

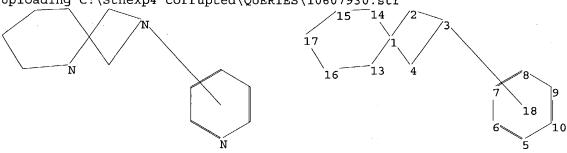
Please note that search-term pricing does apply when conducting SmartSELECT searches.

Crossover limits have been increased. See HELP CROSSOVER for details.

Experimental and calculated property data are now available. For more information enter HELP PROP at an arrow prompt in the file or refer to the file summary sheet on the web at: http://www.cas.org/ONLINE/DBSS/registryss.html

=>

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ring nodes :

1 2 3 4 5 6 7 8 9 10 13 14 15 16 17

ring bonds :

exact/norm bonds :

1-4 1-2 1-13 1-14 2-3 3-4 13-16 14-15 15-17 16-17

normalized bonds :

5-6 5-10 6-7 7-8 8-9 9-10

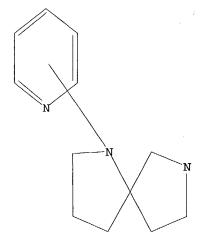
## G1:C,N

Match level :

1:Atom 2:Atom 3:Atom 4:Atom 5:Atom 6:Atom 7:Atom 8:Atom 9:Atom 10:Atom 13:Atom 14:Atom 15:Atom 16:Atom 17:Atom 18:CLASS

STRUCTURE UPLOADED L15

=> d l15 L15 HAS NO ANSWERS L15 STR



G1 C,N

Structure attributes must be viewed using STN Express query preparation.

=> s 115

SAMPLE SEARCH INITIATED 15:23:38 FILE 'REGISTRY' SAMPLE SCREEN SEARCH COMPLETED - 307 TO ITERATE

100.0% PROCESSED 307 ITERATIONS 0 ANSWERS

SEARCH TIME: 00.00.01

FULL FILE PROJECTIONS: ONLINE \*\*COMPLETE\*\*

> BATCH \*\*COMPLETE\*\*

PROJECTED ITERATIONS:

5089 TO

PROJECTED ANSWERS:

7191 0 TO

L16

0 SEA SSS SAM L15

=> a 115 ful

A IS NOT A RECOGNIZED COMMAND

The previous command name entered was not recognized by the system. For a list of commands available to you in the current file, enter "HELP COMMANDS" at an arrow prompt (=>).

=> s l15 ful

FULL SEARCH INITIATED 15:23:49 FILE 'REGISTRY' FULL SCREEN SEARCH COMPLETED - 6161 TO ITERATE

100.0% PROCESSED 6161 ITERATIONS SEARCH TIME: 00.00.01

4 ANSWERS

L17 4 SEA SSS FUL L15

=> file caplus COST IN U.S. DOLLARS SINCE FILE TOTAL ENTRY SESSION FULL ESTIMATED COST 155.42 743.03 DISCOUNT AMOUNTS (FOR QUALIFYING ACCOUNTS) SINCE FILE TOTAL ENTRY SESSION CA SUBSCRIBER PRICE 0.00 -16.80

FILE 'CAPLUS' ENTERED AT 15:23:52 ON 22 SEP 2004 USE IS SUBJECT TO THE TERMS OF YOUR STN CUSTOMER AGREEMENT. PLEASE SEE "HELP USAGETERMS" FOR DETAILS. COPYRIGHT (C) 2004 AMERICAN CHEMICAL SOCIETY (ACS)

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FILE COVERS 1907 - 22 Sep 2004 VOL 141 ISS 13 FILE LAST UPDATED: 21 Sep 2004 (20040921/ED)

This file contains CAS Registry Numbers for easy and accurate substance identification.

=> s 117 L18 1 L17

=> d abs bib fhitstr

L18 ANSWER 1 OF 1 CAPLUS COPYRIGHT 2004 ACS on STN GI

AΒ Compds., pharmaceutical compns. including the compds., and methods of preparation and use thereof are disclosed. The compds. are N-aryl diazaspirocyclic compds. (shown as I and II; variables defined below; e.q. III), bridged analogs of N-heteroaryl diazaspirocyclic compds., or prodrugs or metabolites of these compds. The aryl group can be a five or six-membered heterocyclic ring (heteroaryl). The compds. and compns. can be used to treat and/or prevent a wide variety of conditions or disorders, particularly those disorders characterized by dysfunction of nicotinic cholinergic neurotransmission, including disorders involving neuromodulation of neurotransmitter release, such as dopamine release. CNS disorders, which were characterized by an alteration in normal neurotransmitter release, are another example of disorders that can be treated and/or prevented. The compds. and compns. can also be used to alleviate pain. The compds. can alter the number of nicotinic cholinergic receptors of the brain of the patient, exhibit neuroprotective effects and when employed in effective amts., not result in appreciable adverse side effects (e.g. side effects such as significant increases in blood pressure and heart rate, significant neg. effects upon the gastrointestinal tract, and significant effects upon skeletal muscle). For the  $\alpha4\beta2$ subtype, the Ki value for each of the examples of I was <1  $\mu$ M, indicating that I bind tightly to the receptor. Although the methods of preparation are not claimed, 13 example prepns. are included. For example, III was prepared in 5 steps (76, 93, 96, 66 and 88 % yields, resp.) starting from Et (S)-N-benzylpyrrolidine-2-carboxylate and nitroethylene and involving intermediates Et 2-(2-nitroethyl)-1-benzylpyrrolidine-2carboxylate, 6-benzyl-2,6-diazaspiro[4.4]nonan-1-one, 1-benzyl-1,7diazaspiro[4.4] nonane and 1-benzyl-7-(3-pyridyl)-1,7diazaspiro[4.4] nonane. For I: Q1 is (CZ2)u; QII is (CZ2)v; QIII is (CZ2)w; and QIV is (CZ2)x; u, v, w and x are individually 0-4, preferably 0-3; R is H, lower alkyl, acyl, alkoxycarbonyl or aryloxycarbonyl; Z is H

```
and (un) substituted alkyl, cycloalkyl, heterocyclyl, aryl, alkylaryl,
     arylalkyl; Cy is a six membered ring linked via C to the N of the rest of
     I and each of the remaining ring atoms = N, N bonded to O or C bonded to a
     substituent species, wherein ≤3 are N or N bonded to O, or Cy is a
     five 5-membered heteroarom. ring linked via C to the N of the rest of I;
     addnl. details are given in the claims. For II: QV = (CZ2)y; QVI =
     (CZ2)z; y and z = 0-4; the bridged diazaspirocyclic ring contains 8-13
     members; the rest of the variables are defined similarly to those for I.
     2004:41475 CAPLUS
AN
DN
     140:111404
     Preparation of N-aryl diazaspirocyclic compounds as nicotinic cholinerqic
TΙ
     receptor modulators for treating nervous system and other disorders
     Bhatti, Balwinder S.; Miller, Craig H.; Schmidt, Jeffrey D.
IN
PA
     Targacept, Inc., USA
SO
     PCT Int. Appl., 101 pp.
     CODEN: PIXXD2
DT
     Patent
    English
LA
FAN.CNT 1
     PATENT NO.
                         KIND
                                DATE
                                            APPLICATION NO.
                                                                   DATE
                         _ _ _ _
                                            ______
                                                                   _____
PΙ
    WO 2004005293
                                20040115
                                            WO 2003-US20524
                                                                   20030627
                         Α2
    WO 2004005293
                         А3
                                20040513
         W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN,
             CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH,
             GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR,
            LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH,
             PL, PT, SD, SE, SG, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US,
            UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM
         RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG,
            CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IT, LU, MC,
            NL, PT, RO, SE, SI, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ,
            GW, ML, MR, NE, SN, TD, TG
    US 2004067930
                                            US 2003-607930
                         A1
                                20040408
                                                                   20030627
PRAI US 2002-394337P
                                20020705
    MARPAT 140:111404
    646055-65-4P, 1-(3-Pyridyl)-1,7-diazaspiro[4.4]nonane
    RL: PAC (Pharmacological activity); RCT (Reactant); SPN (Synthetic
    preparation); THU (Therapeutic use); BIOL (Biological study); PREP
     (Preparation); RACT (Reactant or reagent); USES (Uses)
        (drug candidate; preparation of N-aryl diazaspirocyclic compds. as nicotinic
       cholinergic receptor modulators for treating nervous system and other
       disorders)
     646055-65-4 CAPLUS
RN
CN
    1,7-Diazaspiro[4.4]nonane, 1-(3-pyridinyl)- (9CI) (CA INDEX NAME)
```

=> file registry COST IN U.S. DOLLARS SINCE FILE TOTAL SESSION **ENTRY** 748.67 FULL ESTIMATED COST 5.64 TOTAL SINCE FILE DISCOUNT AMOUNTS (FOR QUALIFYING ACCOUNTS) ENTRY SESSION -0.70 -17.50 CA SUBSCRIBER PRICE

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STRUCTURE FILE UPDATES: 21 SEP 2004 HIGHEST RN 749178-43-6 DICTIONARY FILE UPDATES: 21 SEP 2004 HIGHEST RN 749178-43-6

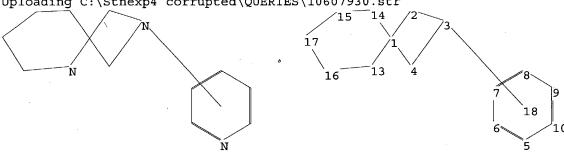
TSCA INFORMATION NOW CURRENT THROUGH MAY 21, 2004

Please note that search-term pricing does apply when conducting SmartSELECT searches.

Crossover limits have been increased. See HELP CROSSOVER for details.

Experimental and calculated property data are now available. For more information enter HELP PROP at an arrow prompt in the file or refer to the file summary sheet on the web at: http://www.cas.org/ONLINE/DBSS/registryss.html

Uploading C:\Stnexp4 corrupted\QUERIES\10607930.str



ring nodes : 1 2 3 4 15 16 17 10 13 ring bonds : 1-4 1-2 1-13 1-14 2-3 3 - 4 5-6 5-10 6-7 7-8 8-9 9-10 13-16 14-15 15-17 16-17 exact/norm bonds : 1-4 1-2 1-13 1-14 2-3 3-4 13-16 14-15 15-17 16-17 normalized bonds : 5-6 5-10 6-7 7-8 8-9 9-10

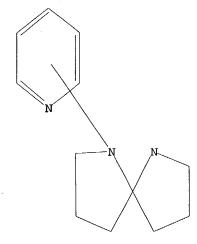
G1:C,N

Match level :

1:Atom 2:Atom 3:Atom 4:Atom 5:Atom 6:Atom 7:Atom 8:Atom 9:Atom 10:Atom 13:Atom 14:Atom 15:Atom 16:Atom 17:Atom 18:CLASS

L19 STRUCTURE UPLOADED

=> d l19 L19 HAS NO ANSWERS L19 STR



G1 C, N

Structure attributes must be viewed using STN Express query preparation.

=> s 119

SAMPLE SEARCH INITIATED 15:25:32 FILE 'REGISTRY' SAMPLE SCREEN SEARCH COMPLETED - 41 TO ITERATE

100.0% PROCESSED

41 ITERATIONS

0 ANSWERS

SEARCH TIME: 00.00.01

FULL FILE PROJECTIONS: ONLINE \*\*COMPLETE\*\*

BATCH

\*\*COMPLETE\*\*

PROJECTED ITERATIONS:

436 TO

1204

PROJECTED ANSWERS:

0 TO

L20

0 SEA SSS SAM L19

=> s l19 ful

FULL SEARCH INITIATED 15:25:37 FILE 'REGISTRY' FULL SCREEN SEARCH COMPLETED - 605 TO ITERATE

100.0% PROCESSED

605 ITERATIONS

0 ANSWERS

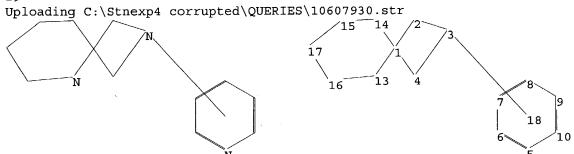
SEARCH TIME: 00.00.01

10607930

L21

0 SEA SSS FUL L19

=>



ring nodes :

1 2 3 4 5 6 7 8 9 10 13 14 15 16 17

ring bonds :

 $1 - 4 \ \ 1 - 2 \ \ 1 - 13 \ \ 1 - 14 \ \ 2 - 3 \ \ 3 - 4 \ \ 5 - 6 \ \ 5 - 10 \ \ 6 - 7 \ \ 7 - 8 \ \ 8 - 9 \ \ 9 - 10 \ \ 13 - 16 \ \ 14 - 15 \ \ 15 - 17$ 

16-17

exact/norm bonds :

 $1-4 \quad 1-2 \quad 1-13 \quad 1-14 \quad 2-3 \quad 3-4 \quad 13-16 \quad 14-15 \quad 15-17 \quad 16-17$ 

normalized bonds :

5-6 5-10 6-7 7-8 8-9 9-10

G1:C,N

Match level :

1:Atom 2:Atom 3:Atom 4:Atom 5:Atom 6:Atom 7:Atom 8:Atom 9:Atom 10:Atom

13:Atom 14:Atom 15:Atom 16:Atom 17:Atom 18:CLASS

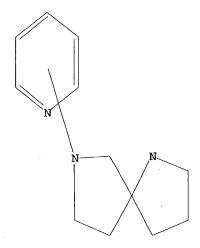
L22 STRUCTURE UPLOADED

=> d 122

L22 HAS NO ANSWERS

L22

STE



G1 C, N

Structure attributes must be viewed using STN Express query preparation.

=> s 122

SAMPLE SEARCH INITIATED 15:26:48 FILE 'REGISTRY' SAMPLE SCREEN SEARCH COMPLETED - 307 TO ITERATE

100.0% PROCESSED 307 ITERATIONS

2 ANSWERS

SEARCH TIME: 00.00.01

FULL FILE PROJECTIONS: ONLINE \*\*COMPLETE\*\*

BATCH \*\*COMPLETE\*\*

PROJECTED ITERATIONS:

5089 TO 7191

PROJECTED ANSWERS:

2 TO 124

L23 2 SEA

2 SEA SSS SAM L22

=> s 122 ful

FULL SEARCH INITIATED 15:26:53 FILE 'REGISTRY'
FULL SCREEN SEARCH COMPLETED - 6161 TO ITERATE

100.0% PROCESSED 6161 ITERATIONS

40 ANSWERS

SEARCH TIME: 00.00.01

L24 40 SEA SSS FUL L22

=> file caplus

COST IN U.S. DOLLARS SINCE FILE TOTAL

ENTRY SESSION

FULL ESTIMATED COST 311.26 1059.93

DISCOUNT AMOUNTS (FOR QUALIFYING ACCOUNTS)

SINCE FILE TOTAL
ENTRY SESSION

CA SUBSCRIBER PRICE 0.00 -17.50

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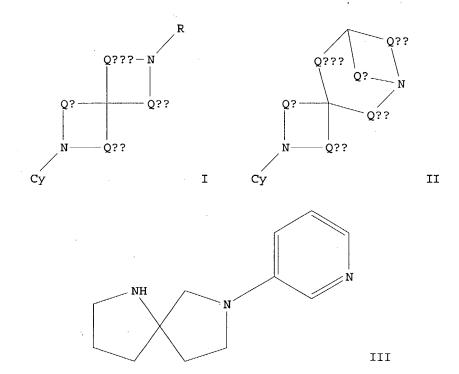
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FILE COVERS 1907 - 22 Sep 2004 VOL 141 ISS 13 FILE LAST UPDATED: 21 Sep 2004 (20040921/ED)

This file contains CAS Registry Numbers for easy and accurate substance identification.

=> d abs bib fhitstr 1-2

L25 ANSWER 1 OF 2 CAPLUS COPYRIGHT 2004 ACS on STN GI



```
Compds., pharmaceutical compns. including the compds., and methods of
AΒ
     preparation and use thereof are disclosed. The compds. are N-aryl
     diazaspirocyclic compds. (shown as I and II; variables defined below; e.g.
     III), bridged analogs of N-heteroaryl diazaspirocyclic compds., or
     prodrugs or metabolites of these compds. The aryl group can be a five or
     six-membered heterocyclic ring (heteroaryl). The compds. and compns. can
     be used to treat and/or prevent a wide variety of conditions or disorders,
     particularly those disorders characterized by dysfunction of nicotinic
     cholinergic neurotransmission, including disorders involving
     neuromodulation of neurotransmitter release, such as dopamine release.
     CNS disorders, which were characterized by an alteration in normal
     neurotransmitter release, are another example of disorders that can be
     treated and/or prevented. The compds. and compns. can also be used to
     alleviate pain. The compds. can alter the number of nicotinic cholinergic
     receptors of the brain of the patient, exhibit neuroprotective effects and
     when employed in effective amts., not result in appreciable adverse side
     effects (e.g. side effects such as significant increases in blood pressure
     and heart rate, significant neg. effects upon the gastrointestinal tract,
     and significant effects upon skeletal muscle). For the \alpha4\beta2
     subtype, the Ki value for each of the examples of I was <1 \muM,
     indicating that I bind tightly to the receptor. Although the methods of preparation are not claimed, 13 example prepns. are included. For example, III
     was prepared in 5 steps (76, 93, 96, 66 and 88 % yields, resp.) starting
     from Et (S)-N-benzylpyrrolidine-2-carboxylate and nitroethylene and
     involving intermediates Et 2-(2-nitroethyl)-1-benzylpyrrolidine-2-
     carboxylate, 6-benzyl-2,6-diazaspiro[4.4]nonan-1-one, 1-benzyl-1,7-
     diazaspiro[4.4] nonane and 1-benzyl-7-(3-pyridyl)-1,7-
     diazaspiro[4.4] nonane. For I: Q1 is (CZ2)u; QII is (CZ2)v; QIII is
     (CZ2)w; and QIV is (CZ2)x; u, v, w and x are individually 0-4, preferably
     0-3; R is H, lower alkyl, acyl, alkoxycarbonyl or aryloxycarbonyl; Z is H
     and (un) substituted alkyl, cycloalkyl, heterocyclyl, aryl, alkylaryl,
     arylalkyl; Cy is a six membered ring linked via C to the N of the rest of
     I and each of the remaining ring atoms = N, N bonded to O or C bonded to a
     substituent species, wherein ≤3 are N or N bonded to O, or Cy is a
     five 5-membered heteroarom. ring linked via C to the N of the rest of I;
     addnl. details are given in the claims. For II: QV = (CZ2)y; QVI =
     (CZ2)z; y and z = 0-4; the bridged diazaspirocyclic ring contains 8-13
     members; the rest of the variables are defined similarly to those for I.
ΔN
     2004:41475
                CAPLUS
DN
     140:111404
ΤI
     Preparation of N-aryl diazaspirocyclic compounds as nicotinic cholinergic
     receptor modulators for treating nervous system and other disorders
IN
     Bhatti, Balwinder S.; Miller, Craig H.; Schmidt, Jeffrey D.
PΑ
     Targacept, Inc., USA
SO
     PCT Int. Appl., 101 pp.
     CODEN: PIXXD2
DT
     Patent
     English
LΑ
FAN.CNT 1
     PATENT NO.
                         KIND
                                 DATE
                                             APPLICATION NO.
                                                                     DATE
                         ----
                                 -----
PΙ
     WO 2004005293
                          A2
                                 20040115
                                             WO 2003-US20524
                                                                     20030627
     WO 2004005293
                         A3
                                 20040513
         W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN,
             CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH,
             GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR,
             LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH,
```

PL, PT, SD, SE, SG, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PT, RO, SE, SI, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG 20040408 US 2003-607930 20030627 US 2004067930 A1 PRAI US 2002-394337P P 20020705 MARPAT 140:111404 646055-99-4P, (+)-7-(3-Pyridyl)-1,7-diazaspiro[4.4] nonane ITRL: PAC (Pharmacological activity); PUR (Purification or recovery); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses) (drug candidate; preparation of N-aryl diazaspirocyclic compds. as nicotinic cholinergic receptor modulators for treating nervous system and other disorders) 646055-99-4 CAPLUS RN1,7-Diazaspiro[4.4]nonane, 7-(3-pyridinyl)-, (+)- (9CI) (CA INDEX NAME) CN

Rotation (+).

L25 ANSWER 2 OF 2 CAPLUS COPYRIGHT 2004 ACS on STN GI

$$R^5$$
 $R^4$ 
 $R^3$ 
 $R^6$ 
 $N$ 
 $S$ 
 $R^1$ 
 $R^2$ 
 $I$ 

AB The title compds. (I; X = N or C-Rx, with Rx =H, halogen; R1, R2 = H, halogen; R3 = H, carboxyl; R4 = oxo, OH; R5 = H, amino; R6 = substituted cyclic amino groups) and their physiol. acceptable salts are claimed as antitumor drugs. Thus, I were prepared, and their antitumor activities were

tested in animal models.

AN 1997:594555 CAPLUS

DN 127:288165

TIAntitumor compounds

Tomita, Kyoji; Chiba, Katsumi; Kashimoto, Shigeki; Nakada, Katsuhisa; IN Shibamori, Koichiro; Chikugi, Yasutomo; Tajima, Masanori; Oue, Tomio Dainippon Pharmaceutical Co., Ltd., Japan

PA

SO Jpn. Kokai Tokkyo Koho, 74 pp.

CODEN: JKXXAF

DTPatent

Japanese LA

FAN. CNT 1

| PAN. | PATENT NO.     | KIND | DATE     | APPLICATION NO. | DATE     |  |
|------|----------------|------|----------|-----------------|----------|--|
|      |                |      |          |                 |          |  |
| ΡI   | JP 09221424    | A2   | 19970826 | JP 1996-351948  | 19961210 |  |
| PRAI | JP 1995-347310 |      | 19951213 |                 |          |  |

MARPAT 127:288165

os

IT196821-77-9P

RL: SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses) (antitumor compds.)

196821-77-9 CAPLUS RN

1,8-Naphthyridine-3-carboxylic acid, 6-fluoro-1,4-dihydro-7-(9-methylene-CN 1,7-diazaspiro[4.4]non-7-yl)-4-oxo-1-(2-thiazolyl)- (9CI) (CA INDEX NAME)

| => file registry                           |            |         |
|--|------------|---------|
| COST IN U.S. DOLLARS                       | SINCE FILE | TOTAL   |
| •  | ENTRY      | SESSION |
| FULL ESTIMATED COST                        | 9.96       | 1069.89 |
|  |            |         |
| DISCOUNT AMOUNTS (FOR QUALIFYING ACCOUNTS) | SINCE FILE | TOTAL   |
|  | ENTRY      | SESSION |
| CA SUBSCRIBER PRICE                        | -1.40      | -18.90  |
|  |            |         |

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STRUCTURE FILE UPDATES: 21 SEP 2004 HIGHEST RN 749178-43-6 DICTIONARY FILE UPDATES: 21 SEP 2004 HIGHEST RN 749178-43-6

TSCA INFORMATION NOW CURRENT THROUGH MAY 21, 2004

Please note that search-term pricing does apply when conducting SmartSELECT searches.

Crossover limits have been increased. See HELP CROSSOVER for details.

Experimental and calculated property data are now available. For more information enter HELP PROP at an arrow prompt in the file or refer to the file summary sheet on the web at: http://www.cas.org/ONLINE/DBSS/registryss.html

| => file registry                           |            |         |
|--|------------|---------|
| COST IN U.S. DOLLARS                       | SINCE FILE | TOTAL   |
|  | ENTRY      | SESSION |
| FULL ESTIMATED COST                        | 0.84       | 1070.73 |
|  |            |         |
| DISCOUNT AMOUNTS (FOR QUALIFYING ACCOUNTS) | SINCE FILE | TOTAL   |
|  | ENTRY      | SESSION |
| CA SUBSCRIBER PRICE                        | 0.00       | -18.90  |

FILE 'REGISTRY' ENTERED AT 15:28:33 ON 22 SEP 2004 USE IS SUBJECT TO THE TERMS OF YOUR STN CUSTOMER AGREEMENT. PLEASE SEE "HELP USAGETERMS" FOR DETAILS. COPYRIGHT (C) 2004 American Chemical Society (ACS)

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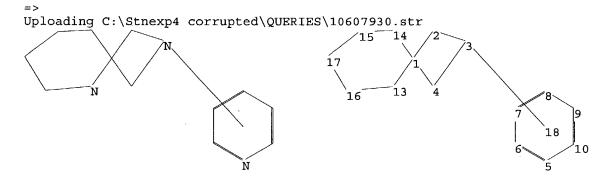
STRUCTURE FILE UPDATES: 21 SEP 2004 HIGHEST RN 749178-43-6 DICTIONARY FILE UPDATES: 21 SEP 2004 HIGHEST RN 749178-43-6

TSCA INFORMATION NOW CURRENT THROUGH MAY 21, 2004

Please note that search-term pricing does apply when conducting SmartSELECT searches.

Crossover limits have been increased. See HELP CROSSOVER for details.

Experimental and calculated property data are now available. For more information enter HELP PROP at an arrow prompt in the file or refer to the file summary sheet on the web at: http://www.cas.org/ONLINE/DBSS/registryss.html



ring nodes :

1 2 3 4 5 6 7 8 9 10 13 14 15 16 17

ring bonds :

1-4 1-2 1-13 1-14 2-3 3-4 5-6 5-10 6-7 7-8 8-9 9-10 13-16 14-15 15-17 16-17

exact/norm bonds :

1-4 1-2 1-13 1-14 2-3 3-4 13-16 14-15 15-17 16-17

normalized bonds :

5-6 5-10 6-7 7-8 8-9 9-10

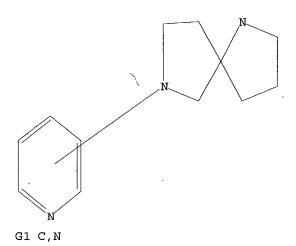
G1:C,N

Match level :

1:Atom 2:Atom 3:Atom 4:Atom 5:Atom 6:Atom 7:Atom 8:Atom 9:Atom 10:Atom 13:Atom 14:Atom 15:Atom 16:Atom 17:Atom 18:CLASS

L26 STRUCTURE UPLOADED

=> d 126 L26 HAS NO ANSWERS L26 STR



Structure attributes must be viewed using STN Express query preparation.

=> s 126

SAMPLE SEARCH INITIATED 15:28:53 FILE 'REGISTRY'
SAMPLE SCREEN SEARCH COMPLETED - 307 TO ITERATE

100.0% PROCESSED 307 ITERATIONS SEARCH TIME: 00.00.01

2 ANSWERS

FULL FILE PROJECTIONS: ONLINE \*\*COMPLETE\*\*

BATCH \*\*COMPLETE\*\*

PROJECTED ITERATIONS:

5089 TO 7191

10607930

PROJECTED ANSWERS:

2 TO 124

L27

2 SEA SSS SAM L26

=> s 126 ful

FULL SEARCH INITIATED 15:28:59 FILE 'REGISTRY'
FULL SCREEN SEARCH COMPLETED - 6161 TO ITERATE

100.0% PROCESSED 6161 ITERATIONS

40 ANSWERS

SEARCH TIME: 00.00.01

L28 40 SEA SSS FUL L26

=> file caplus

COST IN U.S. DOLLARS
SINCE FILE TOTAL
ENTRY SESSION
FULL ESTIMATED COST
155.42
1226.15

DISCOUNT AMOUNTS (FOR QUALIFYING ACCOUNTS)

SINCE FILE
ENTRY
SESSION
CA SUBSCRIBER PRICE

0.00
-18.90

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FILE COVERS 1907 - 22 Sep 2004 VOL 141 ISS 13 FILE LAST UPDATED: 21 Sep 2004 (20040921/ED)

This file contains CAS Registry Numbers for easy and accurate substance identification.

=> s 128

L29 2 L28

=> d abs bib fhitstr 1-2

L29 ANSWER 1 OF 2 CAPLUS COPYRIGHT 2004 ACS on STN GI

AB Compds., pharmaceutical compns. including the compds., and methods of preparation and use thereof are disclosed. The compds. are N-aryl diazaspirocyclic compds. (shown as I and II; variables defined below; e.q. III), bridged analogs of N-heteroaryl diazaspirocyclic compds., or prodrugs or metabolites of these compds. The aryl group can be a five or six-membered heterocyclic ring (heteroaryl). The compds. and compns. can be used to treat and/or prevent a wide variety of conditions or disorders, particularly those disorders characterized by dysfunction of nicotinic cholinergic neurotransmission, including disorders involving neuromodulation of neurotransmitter release, such as dopamine release. CNS disorders, which were characterized by an alteration in normal neurotransmitter release, are another example of disorders that can be treated and/or prevented. The compds. and compns. can also be used to alleviate pain. The compds. can alter the number of nicotinic cholinergic receptors of the brain of the patient, exhibit neuroprotective effects and when employed in effective amts., not result in appreciable adverse side effects (e.g. side effects such as significant increases in blood pressure and heart rate, significant neg. effects upon the gastrointestinal tract, and significant effects upon skeletal muscle). For the  $\alpha 4\beta 2$ subtype, the Ki value for each of the examples of I was <1  $\mu$ M, indicating that I bind tightly to the receptor. Although the methods of preparation are not claimed, 13 example prepns. are included. For example, III was prepared in 5 steps (76, 93, 96, 66 and 88 % yields, resp.) starting from Et (S)-N-benzylpyrrolidine-2-carboxylate and nitroethylene and involving intermediates Et 2-(2-nitroethyl)-1-benzylpyrrolidine-2carboxylate, 6-benzyl-2,6-diazaspiro[4.4]nonan-1-one, 1-benzyl-1,7diazaspiro[4.4] nonane and 1-benzyl-7-(3-pyridyl)-1,7diazaspiro[4.4] nonane. For I: Q1 is (CZ2)u; QII is (CZ2)v; QIII is (CZ2)w; and QIV is (CZ2)x; u, v, w and x are individually 0-4, preferably 0-3; R is H, lower alkyl, acyl, alkoxycarbonyl or aryloxycarbonyl; Z is H

```
and (un) substituted alkyl, cycloalkyl, heterocyclyl, aryl, alkylaryl,
     arylalkyl; Cy is a six membered ring linked via C to the N of the rest of
     I and each of the remaining ring atoms = N, N bonded to O or C bonded to a
     substituent species, wherein ≤3 are N or N bonded to O, or Cy is a
     five 5-membered heteroarom. ring linked via C to the N of the rest of I;
     addnl. details are given in the claims. For II: QV = (CZ2)y; QVI =
     (CZ2)z; y and z = 0-4; the bridged diazaspirocyclic ring contains 8-13
     members; the rest of the variables are defined similarly to those for I.
AN
     2004:41475
                CAPLUS
     140:111404
DN
     Preparation of N-aryl diazaspirocyclic compounds as nicotinic cholinergic
TI
     receptor modulators for treating nervous system and other disorders
IN
     Bhatti, Balwinder S.; Miller, Craig H.; Schmidt, Jeffrey D.
PA
     Targacept, Inc., USA
     PCT Int. Appl., 101 pp.
SO
     CODEN: PIXXD2
DT
     Patent
LΑ
     English
FAN.CNT 1
     PATENT NO.
                         KIND
                                DATE
                                            APPLICATION NO.
                                                                    DATE
                         _ _ _ _
PΙ
     WO 2004005293
                          A2
                                20040115
                                            WO 2003-US20524
                                                                    20030627
     WO 2004005293
                                20040513
                         А3
            AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN,
         W:
             CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH,
             GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR,
             LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH,
             PL, PT, SD, SE, SG, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US,
             UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM
         RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG,
             CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IT, LU, MC,
             NL, PT, RO, SE, SI, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ,
             GW, ML, MR, NE, SN, TD, TG
     US 2004067930
                          Α1
                                20040408
                                            US 2003-607930
                                                                    20030627
PRAI US 2002-394337P
                                20020705
OS
     MARPAT 140:111404
     646055-99-4P, (+)-7-(3-Pyridyl)-1,7-diazaspiro[4.4]nonane
     RL: PAC (Pharmacological activity); PUR (Purification or recovery); SPN
     (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study);
     PREP (Preparation); USES (Uses)
        (drug candidate; preparation of N-aryl diazaspirocyclic compds. as nicotinic
        cholinergic receptor modulators for treating nervous system and other
        disorders)
RN
     646055-99-4 CAPLUS
CN
     1,7-Diazaspiro[4.4]nonane, 7-(3-pyridiny1)-, (+)-(9CI) (CA INDEX NAME)
```

Rotation (+).

# L29 ANSWER 2 OF 2 CAPLUS COPYRIGHT 2004 ACS on STN GI

AB The title compds. (I; X = N or C-Rx, with Rx = H, halogen; R1, R2 = H, halogen; R3 = H, carboxyl; R4 = oxo, OH; R5 = H, amino; R6 = substituted cyclic amino groups) and their physiol. acceptable salts are claimed as antitumor drugs. Thus, I were prepared, and their antitumor activities were tested in animal models.

AN 1997:594555 CAPLUS

DN 127:288165

TI Antitumor compounds

IN Tomita, Kyoji; Chiba, Katsumi; Kashimoto, Shigeki; Nakada, Katsuhisa; Shibamori, Koichiro; Chikugi, Yasutomo; Tajima, Masanori; Oue, Tomio

PA Dainippon Pharmaceutical Co., Ltd., Japan

Ι

SO Jpn. Kokai Tokkyo Koho, 74 pp.

CODEN: JKXXAF

DT Patent

LA Japanese

FAN.CNT 1

| I AN . CN I |                   |      |          |                 |          |  |
|-------------|-------------------|------|----------|-----------------|----------|--|
|             | PATENT NO.        | KIND | DATE     | APPLICATION NO. | DATE     |  |
|             |                   |      |          |                 |          |  |
| ΡI          | JP 09221424       | A2   | 19970826 | JP 1996-351948  | 19961210 |  |
| PRAI        | JP 1995-347310    |      | 19951213 |                 |          |  |
| os          | MARPAT 127:288165 |      |          |                 |          |  |

TE 100001 77 00

IT 196821-77-9P

RL: SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses) (antitumor compds.)

RN 196821-77-9 CAPLUS

CN 1,8-Naphthyridine-3-carboxylic acid, 6-fluoro-1,4-dihydro-7-(9-methylene-1,7-diazaspiro[4.4]non-7-yl)-4-oxo-1-(2-thiazolyl)- (9CI) (CA INDEX NAME)

=> file registry COST IN U.S. DOLLARS SINCE FILE TOTAL ENTRY SESSION 1236.11 FULL ESTIMATED COST 9.96 DISCOUNT AMOUNTS (FOR QUALIFYING ACCOUNTS) SINCE FILE TOTAL ENTRY SESSION CA SUBSCRIBER PRICE -1.40 -20.30

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STRUCTURE FILE UPDATES: 21 SEP 2004 HIGHEST RN 749178-43-6 DICTIONARY FILE UPDATES: 21 SEP 2004 HIGHEST RN 749178-43-6

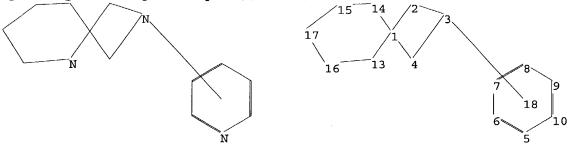
TSCA INFORMATION NOW CURRENT THROUGH MAY 21, 2004

Please note that search-term pricing does apply when conducting SmartSELECT searches.

Crossover limits have been increased. See HELP CROSSOVER for details.

Experimental and calculated property data are now available. For more information enter HELP PROP at an arrow prompt in the file or refer to the file summary sheet on the web at: http://www.cas.org/ONLINE/DBSS/registryss.html

=> Uploading C:\Stnexp4 corrupted\QUERIES\10607930.str



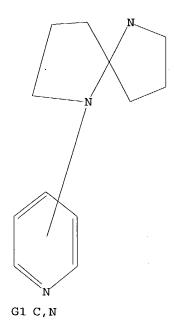
ring nodes:
1 2 3 4 5 6 7 8 9 10 13 14 15 16 17
ring bonds:
1-4 1-2 1-13 1-14 2-3 3-4 5-6 5-10 6-7 7-8 8-9 9-10 13-16 14-15 15-17
16-17
exact/norm bonds:
1-4 1-2 1-13 1-14 2-3 3-4 13-16 14-15 15-17 16-17
normalized bonds:
5-6 5-10 6-7 7-8 8-9 9-10

G1:C,N

Match level : 1:Atom 2:Atom 3:Atom 4:Atom 5:Atom 6:Atom 7:Atom 8:Atom 9:Atom 10:Atom 13:Atom 14:Atom 15:Atom 16:Atom 17:Atom 18:CLASS

L30 STRUCTURE UPLOADED

=> d 130 L30 HAS NO ANSWERS L30 STR



Structure attributes must be viewed using STN Express query preparation.

=> s 130 SAMPLE SEARCH INITIATED 15:30:57 FILE 'REGISTRY' SAMPLE SCREEN SEARCH COMPLETED - 41 TO ITERATE

100.0% PROCESSED

41 ITERATIONS

0 ANSWERS

SEARCH TIME: 00.00.01

FULL FILE PROJECTIONS:

ONLINE \*\*COMPLETE\*\*

BATCH

\*\*COMPLETE\*\*
436 TO 1204

PROJECTED ITERATIONS: PROJECTED ANSWERS:

0 TO

'n

L31

0 SEA SSS SAM L30

=> s 130 ful

FULL SEARCH INITIATED 15:31:03 FILE 'REGISTRY'
FULL SCREEN SEARCH COMPLETED - 605 TO ITERATE

100.0% PROCESSED

605 ITERATIONS

0 ANSWERS

SEARCH TIME: 00.00.01

L32

0 SEA SSS FUL L30

=> file registry

COST IN U.S. DOLLARS

SINCE FILE

TOTAL

FULL ESTIMATED COST

ENTRY

SESSION 1393.63

157.52

DISCOUNT AMOUNTS (FOR QUALIFYING ACCOUNTS)

SINCE FILE

 ${\tt TOTAL}$ 

CA SUBSCRIBER PRICE

ENTRY 0.00 SESSION -20.30

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STRUCTURE FILE UPDATES: 21 SEP 2004 HIGHEST RN 749178-43-6 DICTIONARY FILE UPDATES: 21 SEP 2004 HIGHEST RN 749178-43-6

TSCA INFORMATION NOW CURRENT THROUGH MAY 21, 2004

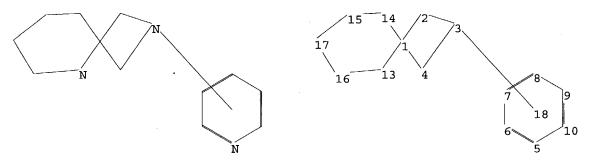
Please note that search-term pricing does apply when conducting SmartSELECT searches.

Crossover limits have been increased. See HELP CROSSOVER for details.

Experimental and calculated property data are now available. For more information enter HELP PROP at an arrow prompt in the file or refer to the file summary sheet on the web at: http://www.cas.org/ONLINE/DBSS/reqistryss.html

=>

Uploading C:\Stnexp4 corrupted\QUERIES\10607930.str



ring nodes :

1 2 3 4 5 6 7 8 9 10 13 14 15 16 17

ring bonds :

1-4 1-2 1-13 1-14 2-3 3-4 5-6 5-10 6-7 7-8 8-9 9-10 13-16 14-15 15-17

16-17

exact/norm bonds :

1-4 1-2 1-13 1-14 2-3 3-4 13-16 14-15 15-17 16-17

normalized bonds :

5-6 5-10 6-7 7-8 8-9 9-10

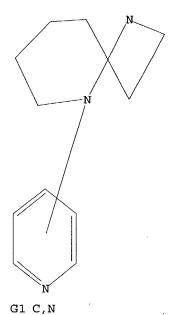
G1:C,N

Match level :

1:Atom 2:Atom 3:Atom 4:Atom 5:Atom 6:Atom 7:Atom 8:Atom 9:Atom 10:Atom 13:Atom 14:Atom 15:Atom 16:Atom 17:Atom 18:CLASS

L33 STRUCTURE UPLOADED

=> d 133 L33 HAS NO ANSWERS L33 STR



Structure attributes must be viewed using STN Express query preparation.

=> s 133 ful FULL SEARCH INITIATED 15:33:30 FILE 'REGISTRY' FULL SCREEN SEARCH COMPLETED - 811 TO ITERATE

100.0% PROCESSED 811 ITERATIONS

0 ANSWERS

SEARCH TIME: 00.00.01

L34

0 SEA SSS FUL L33

Uploading C:\Stnexp4 corrupted\QUERIES\10607930.str

ring nodes : 1 2 3 4 5 6 7 8 9 10 13 14 15 16 17 ring bonds :  $1-4 \quad 1-2 \quad 1-13 \quad 1-14 \quad 2-3 \quad 3-4 \quad 5-6 \quad 5-10 \quad 6-7 \quad 7-8 \quad 8-9 \quad 9-10 \quad 13-16 \quad 14-15 \quad 15-17$ 16-17 exact/norm bonds : 1-4 1-2 1-13 1-14 2-3 3-4 13-16 14-15 15-17 16-17

normalized bonds :

5-6 5-10 6-7 7-8 8-9 9-10

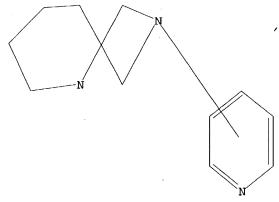
G1:C,N

Match level :

1:Atom 2:Atom 3:Atom 4:Atom 5:Atom 6:Atom 7:Atom 8:Atom 9:Atom 10:Atom 13:Atom 14:Atom 15:Atom 16:Atom 17:Atom 18:CLASS

L35 STRUCTURE UPLOADED

=> d 135 L35 HAS NO ANSWERS L35 STR



G1 C,N

Structure attributes must be viewed using STN Express query preparation.

=> s 135

SAMPLE SEARCH INITIATED 15:35:10 FILE 'REGISTRY' SAMPLE SCREEN SEARCH COMPLETED - 574 TO ITERATE

100.0% PROCESSED 574 ITERATIONS

0 ANSWERS

SEARCH TIME: 00.00.01

FULL FILE PROJECTIONS: ONLINE \*\*COMPLETE\*\*

BATCH \*\*COMPLETE\*\*

PROJECTED ITERATIONS:

10043 TO 12917

PROJECTED ANSWERS:

0 TO

L36

0 SEA SSS SAM L35

=> s 135 ful

FULL SEARCH INITIATED 15:35:14 FILE 'REGISTRY'
FULL SCREEN SEARCH COMPLETED - 11554 TO ITERATE

100.0% PROCESSED 11554 ITERATIONS

SEARCH TIME: 00.00.01

2 ANSWERS

L37 2 SEA SSS FUL L35

=> file caplus

COST IN U.S. DOLLARS
SINCE FILE TOTAL
ENTRY SESSION
FULL ESTIMATED COST
311.68 1705.31

DISCOUNT AMOUNTS (FOR QUALIFYING ACCOUNTS)

SINCE FILE
ENTRY
SESSION
CA SUBSCRIBER PRICE

0.00
-20.30

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FILE COVERS 1907 - 22 Sep 2004 VOL 141 ISS 13 FILE LAST UPDATED: 21 Sep 2004 (20040921/ED)

This file contains CAS Registry Numbers for easy and accurate substance identification.

=> s 137

L38

1 L37

=> d abs bib fhitstr

L38 ANSWER 1 OF 1 CAPLUS COPYRIGHT 2004 ACS on STN GI

Compds., pharmaceutical compns. including the compds., and methods of AB preparation and use thereof are disclosed. The compds. are N-aryl diazaspirocyclic compds. (shown as I and II; variables defined below; e.q. III), bridged analogs of N-heteroaryl diazaspirocyclic compds., or prodrugs or metabolites of these compds. The aryl group can be a five or six-membered heterocyclic ring (heteroaryl). The compds. and compns. can be used to treat and/or prevent a wide variety of conditions or disorders, particularly those disorders characterized by dysfunction of nicotinic cholinergic neurotransmission, including disorders involving neuromodulation of neurotransmitter release, such as dopamine release. CNS disorders, which were characterized by an alteration in normal neurotransmitter release, are another example of disorders that can be treated and/or prevented. The compds. and compns. can also be used to alleviate pain. The compds. can alter the number of nicotinic cholinergic receptors of the brain of the patient, exhibit neuroprotective effects and when employed in effective amts., not result in appreciable adverse side effects (e.g. side effects such as significant increases in blood pressure and heart rate, significant neg. effects upon the gastrointestinal tract, and significant effects upon skeletal muscle). For the  $\alpha 4\beta 2$ subtype, the Ki value for each of the examples of I was <1  $\mu$ M, indicating that I bind tightly to the receptor. Although the methods of preparation are not claimed, 13 example prepns. are included. For example, III was prepared in 5 steps (76, 93, 96, 66 and 88 % yields, resp.) starting from Et (S)-N-benzylpyrrolidine-2-carboxylate and nitroethylene and involving intermediates Et 2-(2-nitroethyl)-1-benzylpyrrolidine-2carboxylate, 6-benzyl-2,6-diazaspiro[4.4]nonan-1-one, 1-benzyl-1,7diazaspiro[4.4] nonane and 1-benzyl-7-(3-pyridyl)-1,7diazaspiro[4.4] nonane. For I: Q1 is (CZ2)u; QII is (CZ2)v; QIII is (CZ2)w; and QIV is (CZ2)x; u, v, w and x are individually 0-4, preferably 0-3; R is H, lower alkyl, acyl, alkoxycarbonyl or aryloxycarbonyl; Z is H

AN

IN

SO

DT

ΡI

os

and (un) substituted alkyl, cycloalkyl, heterocyclyl, aryl, alkylaryl, arylalkyl; Cy is a six membered ring linked via C to the N of the rest of I and each of the remaining ring atoms = N, N bonded to O or C bonded to a substituent species, wherein ≤3 are N or N bonded to O, or Cy is a five 5-membered heteroarom. ring linked via C to the N of the rest of I; addnl. details are given in the claims. For II: QV = (CZ2)y; QVI = (CZ2)z; y and z = 0-4; the bridged diazaspirocyclic ring contains 8-13 members; the rest of the variables are defined similarly to those for I. 2004:41475 CAPLUS DN140:111404 Preparation of N-aryl diazaspirocyclic compounds as nicotinic cholinerqic TΙ receptor modulators for treating nervous system and other disorders Bhatti, Balwinder S.; Miller, Craig H.; Schmidt, Jeffrey D. PATargacept, Inc., USA PCT Int. Appl., 101 pp. CODEN: PIXXD2 Patent LA English FAN.CNT 1 PATENT NO. KIND DATE APPLICATION NO. DATE ----\_\_\_\_\_\_ \_\_\_\_\_ WO 2004005293 A2 20040115 WO 2003-US20524 20030627 WO 2004005293 A3 20040513 AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, SD, SE, SG, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PT, RO, SE, SI, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG US 2004067930 **A1** 20040408 US 2003-607930 20030627 PRAI US 2002-394337P Ρ 20020705 MARPAT 140:111404 646056-68-0P, 2-(3-Pyridyl)-2,5-diazaspiro[3.5]nonane RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

IT

(drug candidate; preparation of N-aryl diazaspirocyclic compds. as nicotinic cholinergic receptor modulators for treating nervous system and other disorders)

RN 646056-68-0 CAPLUS

2,5-Diazaspiro[3.5]nonane, 2-(3-pyridinyl)- (9CI) (CA INDEX NAME) CN

L2

(NONANE OR NONANES)

84 (1013-88-3/BI OR 108-95-2/BI OR 125552-89-8/BI OR 128244-01-9/BI OR 15761-39-4/BI OR 15833-61-1/BI OR 165253-29-2/BI OR 17117-17 -8/BI OR 184849-49-8/BI OR 28232-63-5/BI OR 29943-42-8/BI OR 39926-11-9/BI OR 4595-59-9/BI OR 5680-79-5/BI OR 625-92-3/BI OR 626-35-7/BI OR 626-55-1/BI OR 646055-57-4/BI OR 646055-58-5/BI OR 646055-59-6/BI OR 646055-60-9/BI OR 646055-61-0/BI OR 646055-62-1/BI OR 646055-63-2/BI OR 646055-64-3/BI OR 646055-65-4/BI OR 646055-66-5/BI OR 646055-67-6/BI OR 646055-68-7/BI OR 646055-69-8/BI OR 646055-70-1/BI OR 646055-71-2/BI OR 646055-72-3/BI OR 646055-73-4/BI OR 646055-74-5/BI OR 646055-75-6/BI OR 646055-78-9/BI OR 646055-79-0/BI OR 646055-80-3/BI OR 646055-81-4/BI OR 646055-82-5/BI OR 646055-83-6/BI OR 646055-84-7/BI OR 646055-85-8/BI OR 646055-86-9/BI OR 646055-87-0/BI OR 646055-88-1/BI OR 646055-89-2/BI OR 646055-90-5/BI OR 646055-91-6/BI OR 646055-92-7/BI OR 646055-93-8/BI OR 646055-94-9/BI OR 646055-95-0/BI OR 646055-96-1/BI OR 646055-97-2/BI OR 6460

=> d 12 1-84

L2 ANSWER 1 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

**646056-69-1** REGISTRY RN

(CA CAPLICATION CN 2,5-Diazaspiro[3.5]nonane, 5-methyl-2-(3-pyridinyl)- (9CI) INDEX NAME)

OTHER NAMES:

CN5-Methyl-2-(3-pyridyl)-2,5-diazaspiro[3.5] nonane

MF C13 H19 N3

SR CA

STN Files: CA, CAPLUS, USPATFULL DT.CA CAplus document type: Patent

Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

\*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2ANSWER 2 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

ВN 646056-68-0 REGISTRY

CN2,5-Diazaspiro[3.5]nonane, 2-(3-pyridinyl)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 2-(3-Pyridyl)-2,5-diazaspiro[3.5]nonane

MFC12 H17 N3

SR CA

LC STN Files: CA, CAPLUS, USPATFULL DT.CA CAplus document type: Patent

10607930

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

# \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 3 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN **646056-67-9** REGISTRY

CN 1,6-Diazaspiro[3.5]nonane, 1-methyl-6-(3-pyridinyl)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 1-Methyl-6-(3-pyridyl)-1,6-diazaspiro[3.5] nonane

FS 3D CONCORD

MF C13 H19 N3

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

## \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 4 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN **646056-66-8** REGISTRY

CN 1,6-Diazaspiro[3.5] nonane, 6-(3-pyridinyl)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 6-(3-Pyridyl)-1,6-diazaspiro[3.5]nonane

FS 3D CONCORD

MF C12 H17 N3

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

# \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 5 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-61-3 REGISTRY

CN 2,7-Diazaspiro[4.4]nonane, 2-methyl-7-(5-phenoxy-3-pyridinyl)-

(9CI) (CA INDEX NAME)

OTHER NAMES:

CN 2-Methyl-7-(5-phenoxy-3-pyridyl)-2,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C19 H23 N3 O

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

## \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 6 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-60-2 REGISTRY

CN 2,7-Diazaspiro[4.4] nonane, 2-(5-methoxy-3-pyridinyl)-7-methyl-(9CI) (CA INDEX NAME)

OTHER NAMES:

CN 2-Methyl-7-(5-methoxy-3-pyridyl)-2,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C14 H21 N3 O

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

#### \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 7 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-59-9 REGISTRY

CN 2,7-Diazaspiro[4.4]nonane, 2-methyl-7-(3-pyridinyl)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 2-Methyl-7-(3-pyridyl)-2,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C13 H19 N3

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

# \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

- 1 REFERENCES IN FILE CA (1907 TO DATE)
- 1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 8 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-58-8 REGISTRY

CN 2,7-Diazaspiro[4.4] nonane, 2-(6-methoxy-3-pyridazinyl)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 2-(6-Methoxy-3-pyridazinyl)-2,7-diazaspiro[4.4] nonane

FS 3D CONCORD

MF C12 H18 N4 O

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

### \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 9 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-57-7 REGISTRY

CN 2,7-Diazaspiro[4.4]nonane, 2-(6-chloro-3-pyridiny1)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 2-(6-Chloro-3-pyridyl)-2,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C12 H16 Cl N3

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

## \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 10 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-56-6 REGISTRY

CN 2,7-Diazaspiro[4.4]nonane, 2-(5-ethynyl-3-pyridinyl)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 2-(5-Ethynyl-3-pyridyl)-2,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C14 H17 N3

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

#### \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 11 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN **646056-55-5** REGISTRY

CN Phenol, 4-[[5-(2,7-diazaspiro[4.4]non-2-yl)-3-pyridinyl]oxy]- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 2-[5-(4-Hydroxyphenoxy)-3-pyridyl]-2,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C18 H21 N3 O2

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

## \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

- 1 REFERENCES IN FILE CA (1907 TO DATE)
- 1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 12 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN RN 646056-54-4 REGISTRY

CN 2,7-Diazaspiro[4.4]nonane, 2-(5-phenoxy-3-pyridinyl)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 2-(5-Phenoxy-3-pyridyl)-2,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C18 H21 N3 O

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

## \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 13 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-53-3 REGISTRY

CN 2,7-Diazaspiro[4.4]nonane, 2-[5-(cyclopentyloxy)-3-pyridinyl]-

(9CI) (CA INDEX NAME)

OTHER NAMES:

CN 2-[5-(Cyclopentyloxy)-3-pyridyl]-2,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C17 H25 N3 O

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

\*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 14 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-52-2 REGISTRY

CN 2,7-Diazaspiro[4.4]nonane, 2-(5-methoxy-3-pyridinyl)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 2-(5-Methoxy-3-pyridyl)-2,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C13 H19 N3 O

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

## \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 15 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-51-1 REGISTRY

CN 2,7-Diazaspiro[4.4]nonane, 2-(3-pyridazinyl)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 2-(3-Pyridazinyl)-2,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C11 H16 N4

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

\*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 16 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-50-0 REGISTRY

CN 2,7-Diazaspiro[4.4]nonane, 2-pyrazinyl- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 2-(2-Pyrazinyl)-2,7-diazaspiro[4.4] nonane

FS 3D CONCORD

MF C11 H16 N4

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

## \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 17 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-49-7 REGISTRY

CN 2,7-Diazaspiro[4.4]nonane, 2-(1,3,4-oxadiazol-2-yl)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 2-([1,3,4]Oxadiazol-2-yl)-2,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C9 H14 N4 O

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

# \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 18 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN **646056-48-6** REGISTRY

CN 2,7-Diazaspiro[4.4]nonane, 2-(1,2,4-oxadiazol-5-yl)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 2-([1,2,4]Oxadiazol-5-yl)-2,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C9 H14 N4 O

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

## \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 19 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-47-5 REGISTRY

CN 2,7-Diazaspiro[4.4]nonane, 2-(5-isothiazoly1)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 2-(5-Isothiazolyl)-2,7-diazaspiro[4.4] nonane

FS 3D CONCORD

MF C10 H15 N3 S

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

#### \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 20 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-46-4 REGISTRY

CN 2,7-Diazaspiro[4.4]nonane, 2-(5-isoxazoly1)- (9CI) (CA INDEX NAME)

## OTHER NAMES:

CN 2-(5-Isoxazolyl)-2,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C10 H15 N3 O

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

#### \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 21 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-45-3 REGISTRY

CN 2,7-Diazaspiro[4.4]nonane, 2-(5-pyrimidinyl)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 2-(5-Pyrimidinyl)-2,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C11 H16 N4

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

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# \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 22 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-44-2 REGISTRY

CN 2,7-Diazaspiro[4.4]nonane, 2-(3-pyridinyl)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 2-(3-Pyridy1)-2,7-diazaspiro[4.4] nonane

FS 3D CONCORD

MF C12 H17 N3

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

#### \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 23 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-43-1 REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 7-methyl-1-(3-pyridazinyl)- (9CI)

(CA INDEX NAME)

OTHER NAMES:

CN 7-Methyl-1-(3-pyridazinyl)-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C12 H18 N4

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

## \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 24 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-42-0 REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 7-methyl-1-pyrazinyl- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 7-Methyl-1-(2-pyrazinyl)-1,7-diazaspiro[4.4]nonane
FS 3D CONCORD
MF C12 H18 N4
SR CA
LC STN Files: CA, CAPLUS, USPATFULL
DT.CA CAplus document type: Patent
RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

# \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)
1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 25 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-41-9 REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 7-methyl-1-(1,3,4-oxadiazol-2-yl)-(9CI) (CA INDEX NAME)

OTHER NAMES:

CN 7-Methyl-1-([1,3,4]oxadiazol-2-yl)-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C10 H16 N4 O

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

# \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

- 1 REFERENCES IN FILE CA (1907 TO DATE)
- 1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

ANSWER 26 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN L2646056-40-8 REGISTRY RN1,7-Diazaspiro[4.4] nonane, 7-methyl-1-(1,2,4-oxadiazol-5-yl)-CN (9CI) (CA INDEX NAME) OTHER NAMES: 7-Methyl-1-([1,2,4]oxadiazol-5-yl)-1,7-diazaspiro[4.4]nonane CN FS 3D CONCORD MF C10 H16 N4 O SR CA, CAPLUS, USPATFULL LCSTN Files: DT.CA CAplus document type: Patent Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

\*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)
1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 27 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-39-5 REGISTRY

CN 1,7-Diazaspiro[4.4] nonane, 1-(5-isothiazolyl)-7-methyl- (9CI)
(CA INDEX NAME)

OTHER NAMES:

CN 7-Methyl-1-(5-isothiazolyl)-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C11 H17 N3 S

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P. Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

# \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

- 1 REFERENCES IN FILE CA (1907 TO DATE)
- 1 REFERENCES IN FILE CAPLUS (1907 TO DATE)
- L2 ANSWER 28 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN
- RN **646056-38-4** REGISTRY
- CN 1,7-Diazaspiro[4.4]nonane, 1-(5-isoxazolyl)-7-methyl- (9CI) (CA INDEX NAME)

OTHER NAMES:

- CN 7-Methyl-1-(5-isoxazolyl)-1,7-diazaspiro[4.4]nonane
- FS 3D CONCORD
- MF C11 H17 N3 O
- SR CA
- LC STN Files: CA, CAPLUS, USPATFULL
- DT.CA CAplus document type: Patent
- RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

## \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

- 1 REFERENCES IN FILE CA (1907 TO DATE)
- 1 REFERENCES IN FILE CAPLUS (1907 TO DATE)
- L2 ANSWER 29 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN
- RN 646056-37-3 REGISTRY
- CN 1,7-Diazaspiro[4.4] nonane, 7-methyl-1-(5-pyrimidinyl)- (9CI)
  (CA INDEX NAME)

OTHER NAMES:

- CN 7-Methyl-1-(5-pyrimidinyl)-1,7-diazaspiro[4.4]nonane
- FS 3D CONCORD
- MF C12 H18 N4
- SR CA
- LC STN Files: CA, CAPLUS, USPATFULL
- DT.CA CAplus document type: Patent
- RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

# \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 30 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-36-2 REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 7-methyl-1-(3-pyridinyl)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 7-Methyl-1-(3-pyridyl)-1,7-diazaspiro[4.4] nonane

FS 3D CONCORD

MF C13 H19 N3

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

## \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 31 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-35-1 REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 7-(6-methoxy-3-pyridazinyl)-1-methyl-(9CI) (CA INDEX NAME)

OTHER NAMES:

CN 1-Methyl-7-(6-methoxy-3-pyridazinyl)-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C13 H20 N4 O

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

## \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 32 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-34-0 REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 7-(6-chloro-3-pyridinyl)-1-methyl-(9CI) (CA INDEX NAME)

OTHER NAMES:

CN 1-Methyl-7-(6-chloro-3-pyridyl)-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C13 H18 Cl N3

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

## \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 33 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-33-9 REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 7-(5-ethynyl-3-pyridinyl)-1-methyl-(9CI) (CA INDEX NAME)

OTHER NAMES:

CN 1-Methyl-7-(5-ethynyl-3-pyridyl)-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C15 H19 N3

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

#### \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 34 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-32-8 REGISTRY

CN Phenol, 4-[[5-(1-methyl-1,7-diazaspiro[4.4]non-7-yl)-3-pyridinyl]oxy](9CI) (CA INDEX NAME)

OTHER NAMES:

CN 1-Methyl-7-[5-(4-hydroxyphenoxy)-3-pyridyl]-1,7diazaspiro[4.4]nonane

FS 3D CONCORD

MF C19 H23 N3 O2

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

## \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

- 1 REFERENCES IN FILE CA (1907 TO DATE)
- 1 REFERENCES IN FILE CAPLUS (1907 TO DATE)
- L2 ANSWER 35 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN **646056-31-7** REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 7-[5-(cyclopentyloxy)-3-pyridinyl]-1-methyl- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 1-Methyl-7-[5-(cyclopentyloxy)-3-pyridyl]-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C18 H27 N3 O

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

#### \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 36 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-30-6 REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 7-(5-methoxy-3-pyridinyl)-1-methyl-(9CI) (CA INDEX NAME)

OTHER NAMES:

CN 1-Methyl-7-(5-methoxy-3-pyridyl)-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C14 H21 N3 O

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

# \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

- 1 REFERENCES IN FILE CA (1907 TO DATE)
- 1 REFERENCES IN FILE CAPLUS (1907 TO DATE)
- L2 ANSWER 37 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN
- RN 646056-29-3 REGISTRY
- CN 1,7-Diazaspiro[4.4] nonane, 1-methyl-7-(3-pyridazinyl) (9CI)

(CA INDEX NAME)

OTHER NAMES:

- CN 1-Methyl-7-(3-pyridazinyl)-1,7-diazaspiro[4.4]nonane
- FS 3D CONCORD
- MF C12 H18 N4
- SR CA
- LC STN Files: CA, CAPLUS, USPATFULL
- DT.CA CAplus document type: Patent
- RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

## \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

- 1 REFERENCES IN FILE CA (1907 TO DATE)
- 1 REFERENCES IN FILE CAPLUS (1907 TO DATE)
- L2 ANSWER 38 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN
- RN 646056-28-2 REGISTRY
- CN 1,7-Diazaspiro[4.4]nonane, 1-methyl-7-pyrazinyl- (9CI) (CA INDEX NAME)

OTHER NAMES:

- CN 1-Methyl-7-(2-pyrazinyl)-1,7-diazaspiro[4.4]nonane
- FS 3D CONCORD
- MF C12 H18 N4
- SR CA
- LC STN Files: CA, CAPLUS, USPATFULL
- DT.CA CAplus document type: Patent
- RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

# \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

- 1 REFERENCES IN FILE CA (1907 TO DATE)
- 1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 39 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN **646056-27-1** REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 1-methyl-7-(1,3,4-oxadiazol-2-yl)(9CI) (CA INDEX NAME)

OTHER NAMES:

CN 1-Methyl-7-([1,3,4]oxadiazol-2-yl)-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C10 H16 N4 O

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

$$\bigcap_{N} \bigcap_{O} \bigcap_{N} N$$

## \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 40 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-26-0 REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 1-methyl-7-(1,2,4-oxadiazol-5-yl)-

(9CI) (CA INDEX NAME)

OTHER NAMES:

CN 1-Methyl-7-([1,2,4]oxadiazol-5-yl)-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C10 H16 N4 O

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

1 REFERENCES IN FILE CA (1907 TO DATE) 1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 41 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-25-9 REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 7-(5-isothiazolyl)-1-methyl- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 1-Methyl-7-(5-isothiazolyl)-1,7-diazaspiro[4.4] nonane

FS 3D CONCORD

MF C11 H17 N3 S

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

#### \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 42 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-24-8 REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 7-(5-isoxazolyl)-1-methyl- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 1-Methyl-7-(5-isoxazolyl)-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C11 H17 N3 O

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 43 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN **646056-23-7** REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 1-methyl-7-(5-pyrimidinyl)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 1-Methyl-7-(5-pyrimidinyl)-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C12 H18 N4

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

# \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 44 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-22-6 REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 1-(3-pyridazinyl)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 1-(3-Pyridazinyl)-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C11 H16 N4

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

## \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 45 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN **646056-21-5** REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 1-pyrazinyl- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 1-(2-Pyrazinyl)-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C11 H16 N4

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

### \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 46 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-20-4 REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 1-(1,3,4-oxadiazol-2-yl)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 1-([1,3,4]Oxadiazol-2-yl)-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C9 H14 N4 O

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

# \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 47 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN **646056-19-1** REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 1-(1,2,4-oxadiazol-5-yl)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 1-([1,2,4]0xadiazol-5-yl)-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C9 H14 N4 O

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

### \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

- 1 REFERENCES IN FILE CA (1907 TO DATE)
- 1 REFERENCES IN FILE CAPLUS (1907 TO DATE)
- L2 ANSWER 48 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN
- RN **646056-18-0** REGISTRY
- CN 1,7-Diazaspiro[4.4] nonane, 1-(5-isothiazoly1)- (9CI) (CA INDEX

NAME)

OTHER NAMES:

CN 1-(5-Isothiazolyl)-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C10 H15 N3 S

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

### \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 49 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-17-9 REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 1-(5-isoxazoly1)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 1-(5-Isoxazolyl)-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C10 H15 N3 O

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

## \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

## 1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 50 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-16-8 REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 1-(5-pyrimidinyl)- (9CI) (CA:INDEX NAME)

OTHER NAMES:

CN 1-(5-Pyrimidinyl)-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C11 H16 N4

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

### \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 51 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-15-7 REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 7-(6-methoxy-3-pyridazinyl)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 7-(6-Methoxy-3-pyridazinyl)-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C12 H18 N4 O

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

### \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)
1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 52 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-14-6 REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 7-(6-chloro-3-pyridinyl)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 7-(6-Chloro-3-pyridyl)-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C12 H16 Cl N3

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

## \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 53 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN **646056-13-5** REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 7-(5-ethynyl-3-pyridinyl)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 7-(5-Ethynyl-3-pyridyl)-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C14 H17 N3

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

\*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)
1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 54 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-12-4 REGISTRY

CN Phenol, 4-[[5-(1,7-diazaspiro[4.4]non-7-yl)-3-pyridinyl]oxy]- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 7-[5-(4-Hydroxyphenoxy)-3-pyridyl]-1,7-diazaspiro[4.4] nonane

FS 3D CONCORD

MF C18 H21 N3 O2

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

## \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 55 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-11-3 REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 7-[5-(cyclopentyloxy)-3-pyridinyl](9CI) (CA INDEX NAME)

OTHER NAMES:

CN 7-[5-(Cyclopentyloxy)-3-pyridyl]-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C17 H25 N3 O

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

## \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 56 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-10-2 REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 7-(5-methoxy-3-pyridiny1)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 7-(5-Methoxy-3-pyridyl)-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C13 H19 N3 O

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

### \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 57 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN **646056-09-9** REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 7-(3-pyridazinyl)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 7-(3-Pyridazinyl)-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C11 H16 N4

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

## \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

- 1 REFERENCES IN FILE CA (1907 TO DATE)
- 1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 58 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-08-8 REGISTRY

CN 1,7-Diazaspiro[4.4] nonane, 7-pyrazinyl- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 7-(2-Pyrazinyl)-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C11 H16 N4

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

## \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

- 1 REFERENCES IN FILE CA (1907 TO DATE)
- 1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 59 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN **646056-07-7** REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 7-(1,3,4-oxadiazol-2-yl)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 7-([1,3,4]0xadiazol-2-yl)-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C9 H14 N4 O

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 60 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN **646056-06-6** REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 7-(1,2,4-oxadiazol-5-yl)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 7-([1,2,4]0xadiazol-5-yl)-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C9 H14 N4 O

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

\*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

- 1 REFERENCES IN FILE CA (1907 TO DATE)
- 1 REFERENCES IN FILE CAPLUS (1907 TO DATE)
- L2 ANSWER 61 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN **646056-05-5** REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 7-(5-isothiazoly1)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 7-(5-Isothiazolyl)-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C10 H15 N3 S

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 62 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-04-4 REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 7-(5-isoxazoly1)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 7-(5-Isoxazolyl)-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C10 H15 N3 O

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

### \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

- 1 REFERENCES IN FILE CA (1907 TO DATE)
- 1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 63 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-03-3 REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 7-(5-pyrimidinyl) - (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 7-(5-Pyrimidinyl)-1,7-diazaspiro[4.4] nonane

FS 3D CONCORD

MF C11 H16 N4

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

### \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 64 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-02-2 REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 7-(3-pyridinyl)-1-[(2S)-2-pyrrolidinylcarbonyl]-, (5S)- (9CI) (CA INDEX NAME)

FS STEREOSEARCH

MF C17 H24 N4 O

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: PREP (Preparation); RACT (Reactant or reagent)

Absolute stereochemistry.

## \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 65 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-01-1 REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 7-(3-pyridinyl)-1-[(2S)-2-pyrrolidinylcarbonyl]-, (5R)- (9CI) (CA INDEX NAME)

FS STEREOSEARCH

MF C17 H24 N4 O

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: PREP (Preparation); RACT (Reactant or reagent)

Absolute stereochemistry.

## \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 66 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646056-00-0 REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 7-(3-pyridinyl)-, (-)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN (-)-7-(3-Pyridyl)-1,7-diazaspiro[4.4]nonane

FS STEREOSEARCH

MF C12 H17 N3

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

## Rotation (-).

## \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 67 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN **646055-99-4** REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 7-(3-pyridinyl)-, (+)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN (+)-7-(3-Pyridyl)-1,7-diazaspiro[4.4]nonane

FS STEREOSEARCH

MF C12 H17 N3

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

Rotation (+).

### \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 68 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646055-74-5 REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 1-methyl-7-(5-phenoxy-3-pyridinyl)-, dihydrochloride (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 1-Methyl-7-(5-phenoxy-3-pyridyl)-1,7-diazaspiro[4.4]nonane dihydrochloride

MF C19 H23 N3 O . 2 Cl H

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

CRN (646055-71-2)

## •2 HCl

- 1 REFERENCES IN FILE CA (1907 TO DATE)
- 1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 69 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646055-73-4 REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 7-(5-phenoxy-3-pyridinyl)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 7-(5-Phenoxy-3-pyridyl)-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C18 H21 N3 O

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); RACT (Reactant or reagent); USES (Uses)

## \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 70 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646055-72-3 REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 7-(5-phenoxy-3-pyridinyl)-1-(phenylmethyl)(9CI) (CA INDEX NAME)

OTHER NAMES:

CN 1-Benzyl-7-(5-phenoxy-3-pyridyl)-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C25 H27 N3 O

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: PREP (Preparation); RACT (Reactant or reagent)

### \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

- 1 REFERENCES IN FILE CA (1907 TO DATE)
- 1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 71 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN RN 646055-71-2 REGISTRY

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9/23/04
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1,7-Diazaspiro[4.4]nonane, 1-methyl-7-(5-phenoxy-3-pyridinyl)-(9CI) (CA INDEX NAME) OTHER NAMES: CN 1-Methyl-7-(5-phenoxy-3-pyridyl)-1,7-diazaspiro[4.4]nonane FS 3D CONCORD MF C19 H23 N3 O CICOM CA SR STN Files: LCCA, CAPLUS, USPATFULL DT.CA CAplus document type: Patent Roles from patents: BIOL (Biological study); PREP (Preparation); RACT

### \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

(Reactant or reagent); USES (Uses)

1 REFERENCES IN FILE CA (1907 TO DATE)
1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 72 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646055-70-1 REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 7-(5-ethoxy-3-pyridiny1)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 7-(5-Ethoxy-3-pyridyl)-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C14 H21 N3 O

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: PREP (Preparation); RACT (Reactant or reagent)

## \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 73 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN **646055-69-8** REGISTRY

CN 1,7-Diazaspiro[4.4] nonane, 7-(5-ethoxy-3-pyridinyl)-1-(phenylmethyl)(9CI) (CA INDEX NAME)

OTHER NAMES:

CN 1-Benzyl-7-(5-ethoxy-3-pyridyl)-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C21 H27 N3 O

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: PREP (Preparation); RACT (Reactant or reagent)

## \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 74 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646055-68-7 REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 7-(5-ethoxy-3-pyridinyl)-1-methyl-

(9CI) (CA INDEX NAME)
OTHER NAMES:

CN 1-Methyl-7-(5-ethoxy-3-pyridyl)-1,7-diazaspiro[4.4] nonane

FS 3D CONCORD

MF C15 H23 N3 O

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

### \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 75 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646055-67-6 REGISTRY
CN 1,7-Diazaspiro[4.4]nonane, 7-(3-pyridinyl)- (9CI) (CA INDEX NAME)
OTHER NAMES:

CN 7-(3-Pyridyl)-1,7-diazaspiro[4.4]nonane

FS 3D CONCORD

MF C12 H17 N3

CI COM

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); RACT (Reactant or reagent); USES (Uses)

### \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 76 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN **646055-66-5** REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 1-methyl-7-(3-pyridinyl)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 1-Methyl-7-(3-pyridyl)-1,7-diazaspiro[4.4] nonane

FS 3D CONCORD

MF C13 H19 N3

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

#### \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 77 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

646055-65-4 REGISTRY RN1,7-Diazaspiro[4.4]nonane, 1-(3-pyridinyl)- (9CI) (CA INDEX CN NAME) OTHER NAMES: 1-(3-Pyridyl)-1,7-diazaspiro[4.4] nonane CN3D CONCORD C12 H17 N3 MF CI COM SR CA LCCA, CAPLUS, USPATFULL STN Files: DT.CA CAplus document type: Patent Roles from patents: BIOL (Biological study); PREP (Preparation); RACT (Reactant or reagent); USES (Uses)

#### \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE) 1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

ANSWER 78 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN L2RN646055-64-3 REGISTRY 1,7-Diazaspiro[4.4]nonane-7-carboxylic acid, 1-(3-pyridinyl)-, CN1,1-dimethylethyl ester (9CI) (CA INDEX NAME) tert-Butyl 6-(3-pyridyl)-2,6-diazaspiro[4.4]nonane-2-carboxylate FS 3D CONCORD

MF C17 H25 N3 O2 SR

LC STN Files: CA, CAPLUS, USPATFULL DT.CA CAplus document type: Patent

Roles from patents: PREP (Preparation); RACT (Reactant or reagent)

\*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)
1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 79 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646055-63-2 REGISTRY

CN 1,7-Diazaspiro[4.4]nonane-7-carboxylic acid, 1,1-dimethylethyl ester (9CI) (CA INDEX NAME)

OTHER NAMES:

tert-Butyl 2,6-diazaspiro[4.4]nonane-2-carboxylate

FS 3D CONCORD

MF C12 H22 N2 O2

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: PREP (Preparation); RACT (Reactant or reagent)

### \*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 80 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 646055-62-1 REGISTRY

CN 1,7-Diazaspiro[4.4]nonane-7-carboxylic acid, 1-(phenylmethyl)-,

1,1-dimethylethyl ester (9CI) (CA INDEX NAME)

OTHER NAMES:

CN tert-Butyl 6-benzyl-2,6-diazaspiro[4.4]nonane-2-carboxylate

FS 3D CONCORD

MF C19 H28 N2 O2

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: PREP (Preparation); RACT (Reactant or reagent)

- 1 REFERENCES IN FILE CA (1907 TO DATE)
- 1 REFERENCES IN FILE CAPLUS (1907 TO DATE)
- L2 ANSWER 81 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN
- RN 646055-61-0 REGISTRY
- CN 1,7-Diazaspiro[4.4]nonane, 1-(3-pyridinyl)-, dihydrochloride (9CI) (CA INDEX NAME)

OTHER NAMES:

- CN 1-(3-Pyridyl)-1,7-diazaspiro[4.4] nonane dihydrochloride
- MF C12 H17 N3 . 2 Cl H
- SR CA
- LC STN Files: CA, CAPLUS, USPATFULL
- DT.CA CAplus document type: Patent
- RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)
- CRN (646055-65-4)

## ●2 HCl

- 1 REFERENCES IN FILE CA (1907 TO DATE)
- 1 REFERENCES IN FILE CAPLUS (1907 TO DATE)
- L2 ANSWER 82 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN
- RN 646055-60-9 REGISTRY
- CN 1,7-Diazaspiro[4.4]nonane, 1-(phenylmethyl)-7-(3-pyridinyl)- (9CI) (CA INDEX NAME)

OTHER NAMES:

- CN 1-Benzyl-7-(3-pyridyl)-1,7-diazaspiro[4.4]nonane
- FS 3D CONCORD
- MF C19 H23 N3
- SR CA
- LC STN Files: CA, CAPLUS, USPATFULL
- DT.CA CAplus document type: Patent
- RL.P Roles from patents: PREP (Preparation); RACT (Reactant or reagent)

1 REFERENCES IN FILE CA (1907 TO DATE)

1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 83 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN **646055-57-4** REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 7-(3-pyridinyl)-, dihydrochloride (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 7-(3-Pyridyl)-1,7-diazaspiro[4.4]nonane dihydrochloride

MF C12 H17 N3 . 2 Cl H

SR CA

LC STN Files: CA, CAPLUS, USPATFULL

DT.CA CAplus document type: Patent

RL.P Roles from patents: BIOL (Biological study); PREP (Preparation); USES (Uses)

CRN (646055-67-6)

## ●2 HC1

- 1 REFERENCES IN FILE CA (1907 TO DATE)
- 1 REFERENCES IN FILE CAPLUS (1907 TO DATE)

L2 ANSWER 84 OF 84 REGISTRY COPYRIGHT 2004 ACS on STN

RN 128244-01-9 REGISTRY

CN 1,7-Diazaspiro[4.4]nonane, 1-(phenylmethyl)- (9CI) (CA INDEX NAME)

OTHER NAMES:

CN 1-Benzyl-1,7-diazaspiro[4.4] nonane

FS 3D CONCORD

MF C14 H20 N2

SR CA

LC STN Files: BEILSTEIN\*, CA, CAPLUS, CASREACT, TOXCENTER, USPATFULL (\*File contains numerically searchable property data)

DT.CA CAplus document type: Journal; Patent

RL.P Roles from patents: PREP (Preparation); RACT (Reactant or reagent)

RL.NP Roles from non-patents: PREP (Preparation); RACT (Reactant or reagent)

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\*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

- 2 REFERENCES IN FILE CA (1907 TO DATE)
- 2 REFERENCES IN FILE CAPLUS (1907 TO DATE)

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(FILE 'HOME' ENTERED AT 14:47:31 ON 22 SEP 2004)

FILE 'REGISTRY' ENTERED AT 14:47:42 ON 22 SEP 2004

FILE 'CAPLUS' ENTERED AT 14:47:47 ON 22 SEP 2004 L1 1 S US20040067930/PN SELECT RN L1 1

FILE 'REGISTRY' ENTERED AT 14:48:28 ON 22 SEP 200